EVALUATION OF MANAGING VERIZON WIRELINE’S SOUTHWEST MICHIGAN REMOTE EMPLOYEES

MSA 699 Project Report

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Master of Science in Administration
(Concentration in Leadership)

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Executive Summary

The purpose of this study was to look at the effectiveness of Verizon Wireline’s southwest Michigan virtual team. As stated, the research was specific to the southwest Michigan unit and their supervisor located near Detroit, Michigan. The study consisted of seven remote employees and one supervisor. All eight individuals were sent an invitation to the Survey Monkey questionnaire via individual personal email addresses. A cover letter was included with the invitation that outlined the aspects of the questionnaire and requirements made by Verizon Corporate. These requirements included none of the research was to be done on company time, the use of company assets was prohibited, and private email had to be used for correspondence. The response to the survey was eight out of eight for 100% participation.

The questions consisted of nine Likert scale questions and three open ended questions. The purpose and design of these questions was to identify best practices used in the management of the virtual team located in southwest Michigan, recognize the challenges present in managing this particular virtual team, and ascertain the technologies used in virtual team communications. All nine Likert scale questions were answered by each respondent. However, of the open-ended questions, question 10 had six responses and questions 11 and 12 had seven responses.

The survey had shown that although Verizon Wireline’s manager was somewhat successful in running the virtual team, there were identified problems in communications, training, and a lack of proper tools/test equipment provided. These issues were addressed and recommendations made to include responsible parties required to address such deficiencies. Since this research specifically target only one virtual team within Verizon, it was recommended that future research be expanded to include complete regions within Verizon Wireline. This would provide a more
complete and accurate result on virtual teams within Verizon by expanding the questionnaire pool and avoiding anomalies that may exist in a specific unit with Verizon Wireline.
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Chapter 1: Problem Definition

Background

Verizon Wireline is a subsidiary of one of the largest telecommunications companies in the world. Verizon Communications Inc. was formed when Bell Atlantic and GTE merged in the year 2000. In 2006, Verizon acquired MCI networks a telecommunications company that provided business and local phone services throughout the country. This new merger created Verizon Business (“History and timeline,” 2017). Verizon Business “through several name changes” is now known as Verizon Wireline. At one time, MCI was very busy in the southwest Michigan corridor. There were local call center and field operations managers operating until the downturn of the economy in the late 2000s. Eventually, the call center was moved and consolidated by Verizon soon after the purchase of MCI. Field operations eventually saw massive layoffs and ultimately went from 27 technicians at its peak, to five technicians in early 2011. With the layoffs came a new management structure. It started with a remote manager located in Indiana. In mid-2011, Verizon merged the non-union employees of Verizon Business with the local union employees of Verizon Select Services. Due to this merger all employees became unionized in the southwest Michigan unit. The remote manager was changed from Indiana to Ohio. Due to retirement, it again moved in 2014 to the current day location of Detroit, Michigan.

Today, the workers at the southwest unit consist of one female and six males. Their backgrounds are varied. The female worker used to manage the maintenance dispatch call center in Grand Rapids. She moved onto manage the inside plant technicians once the call center was closed. She eventually went on to work as one of the technicians after the layoffs started. She is one of the go-to people for supervision because of her experience in using the various systems left over from the MCI days that are still in use today. In most virtual teams an emergent leader
evolves and virtual teams generally perform higher this happens (Ziek & Smulowitz, 2014.) She has over the years become the emergent leader.

Of the six male employees, four have prior military experience. With three having some type of military electronic training while serving. Another male employee has previous experience in the call center, and the last was a butcher by trade before joining MCI. Two of the employees have bachelor degrees with another worker having previously attended college. Two of seven were union members when the two workgroups combined in June 2011. All remote employees are considered home dispatch. Six are located between the Grand Rapids and Lansing areas, with one being located in Traverse City.

The first remote manager in Indiana had a background in facilities maintenance. The second manager was in Columbus, Ohio and was a former Verizon Select Services Inc. supervisor who had experience managing union employees. The current manager was assigned to a data network contract Verizon had with General Motors in Detroit. He has worked around union employees but had no previous experience managing them. When General Motors terminated the contract in 2013, it freed up his availability to assume management duties for the southwest Michigan Unit. The frontline manager reports to a senior manager located in Indiana. The senior manager reports to a Director in Illinois and so on until we reach the CEO.

Verizon Wireline spends a substantial amount of time and resources to furnish its employees with the appropriate equipment to do the job. They also provide essential safety training in order to prevent accidents and maximize the man hours each employee provides yearly. Since there is a variety of duties each employee performs, it is vital that they not only be supervised effectively but are retained due to the expense of replacing and training a new employee. Installing new fiber transport equipment, and maintain current systems is vital to the success of Verizon
Wireline and its customers. Each technician has a niche in maintaining the southwest Michigan network and losing one technician hurts the overall mission.

**Research Problem**

Verizon Wireline possesses one of the country’s most robust and extensive networks. Network availability is imperative for customer satisfaction. Also, since being in an industry that is regulated by the Federal Communications Commission (“FCC”) any outages are reportable and fines can be levied if circuits are not restored in a timely manner. The network therefore starts with the employees. They must be managed in an efficient and effective manner. Leading a team can be challenging. Management needs to be committed to working in a virtual setting along with communicating goals, measures, and assessments to the workers in order to provide clear direction (Cascio, 2000.) This challenge becomes just a little bit tougher when taking into account the geographical separation of the manager and his employees. In order to succeed, Verizon Wireline must always look to improve the way we do things and the tools we use in that endeavor.

To continually improve in the area of managing remote employees, the principal question that needs to be asked is; “How effective are the procedures and systems Verizon Wireline uses to successfully manage its remote employees in the southwest Michigan unit?” This question can then be broken down in to the following sub-questions:

1. What are best-practices identified in managing the remote employees?

2. What areas of supervision suffer due to the geographical separation of manager and employee?
3. What specific technologies could be leveraged to enhance communication within the workgroup?

In answering each of these questions, more have been raised. New and innovative ways of managing remote employees have be uncovered and the process refined and improved. The best practices, challenges and technology used to communicate have be examined.

**Research Objective**

In order to maintain status as a world leader in telecommunications products, Verizon Wireline must manage its employees and assets in an efficient and effective manner. This includes managing remote employees in a diversified workforce, which brings a special challenge to front line supervisors. An examination of successful virtual teams has been studied. This includes how the supervisor communicated tasks and goals along with creating a social atmosphere that encourages teamwork. His use of correctly applying technology has also been observed.

The research being done can be utilized by Verizon Wireline’s frontline and mid-level management to assess and improve the management processes used. Additionally, training may be provided to geographically separated managers. This research also examined the technology currently in use and technology available which can be used to improve the process. In order to provide the best network to Verizon Wireline’s customers, it must leverage its most vital asset and that is the employees. To get the most out of this valuable asset, Verizon Wireline needs to apply the most up-to-date techniques and technologies while managing its employees.
Scope

The research focused on the management of remote employees in the southwest Michigan unit of Verizon Wireline. With emphasis on frontline management. The research identified current best practices and technologies being used. Also included, are new advancements in this field along with the latest high-tech equipment used today. Since the sample size of this research is seven employees, it is imperative that surveys be completed by all seven technicians in the southwest Michigan unit. The research focused on valuing the current management system in place. This includes communicating, social interaction, use of technology and the success of the team.

Researcher’s Credentials

The researcher has spent the last seven years working in Verizon Wireline’s southwest Michigan unit. The researcher therefore has direct knowledge of the relationship between remote management and employees, the effectiveness of remote management at this sight, and practices that work and do not. Successes, challenges and the effective use of technology are all subjects the researcher has personal knowledge of.

Definition of Terms

Verizon. A communications company that provides high speed fiber networks and cellular phone services.

MCI. Former telecommunications company absorbed by Verizon.

Verizon Select Services Inc. (VSSI). Former subsidiary of Verizon, renamed Verizon Wireline.

Remote/Virtual team. A team that is geographically separated from the manager and possibly other members.

Remote/Virtual manager. A manager who is geographically separated from the employees he supervises.

Self-efficacy. A person’s belief in themselves and their abilities to succeed in completing tasks and obtaining goals.

Teleworker. An arrangement in which an employee can work from an alternate location, such as their home.

Virtual distance. The feeling of separation from a team while using communication technologies to socialize with their co-workers.

Groupware. A computer program that allows virtual employees to collaborate on a project from different location.

URL. Uniform Resource Locator, an address on the world wide web used to find a particular website.

Likert scale. A system that scales answers to survey questions.

Descriptive statistics. A way to summarize results from survey questions.
Chapter 2: Review of the Related Literature

Introduction to the literature

Literature was collected and reviewed to study and evaluate the effectiveness of managing remote (virtual) teams. Attention was paid to best practices, challenges, training, and available technologies. The synthesis and analysis were derived from peer reviewed articles, studies, and research. The literature in this review was selected based on the topic of managing remote teams.

Remote management success. Lurey and Rasinghani (2001) explain in their article, remote teams are just that, “teams.” These teams face many of the issues of co-located teams. They must have shared purposes and goals to be successful. When present, the workers tend to work as a team to meet those goals. Good managers need to establish positive processes, develop team relationships, and create a reward system that is based on the team. These factors are a great foundation for developing best practices, regardless if the team is remote or co-located. Particularly, to be effective with a remote team, formal processes need to be developed, giving the team a more structured environment. Objectives need to be more explicit and not just assumed. In order to achieve this structure, communications need to be addressed. Most remote team members express interest in a more personal face-to-face contact within the team. This can be established through social interaction outside of the work environment. Management must support this as well as other means of communication to ensure the team remains cohesive. Interpersonal communication makes it easier to complete collaborative work within the team. Technologies such as email, voicemail, and video conferencing can be used to forward this effort. However, internal group dynamics and external support mechanisms must also be present in order to be successful in managing remote employees (Lurey & Rasinghani, 2001).
Research by Ocker, Huang, Benbunan-fich and Hiltz (2011) suggested that leadership is key to influencing team outcomes and processes. A leader uses problem-solving skills and techniques of social control to help the team complete tasks. A leader also provides emotional support to the team. If the emotional support is not adequate, teams may break down and stop working cohesively. Leaders can also be designated or emergent. If a team has both, problems can occur. The emergent leader tends to exert influence over other team members and often clashes with the designated leader. This problem can be amplified in a remotely managed team. In this study, it is also notable that teams with an emergent leader tend to be higher performers. In all, remote leaders who were successful had to bridge the distance gap with the team. As in other studies, it was also noted that a good leader must create an environment in which the team benefits as a whole.

According to Kayworth and Leidner (2002), the trend of physically dispersed work groups has prompted the study of the role and nature of leadership in a virtual setting. The findings show that highly effective virtual leaders show signs of empathy and mentoring towards the team. They also must be assertive without seeming to be overbearing. Also, detailed communications are a must. The findings of the study show that a leader of a remote team must not only have these traits but be able to project them. A good virtual leader must be able to maintain an understanding disposition and caring attitude. Effective communication is necessary to provide crystal clear understanding of goals and the tasks required. Ultimately moving the group to task completion through communications, detailed instructions and rapid feedback (Kayworth & Leidner, 2002).

Cascio (2000) states not all employees are suited to work in a virtual team, just as all managers are not capable of managing these teams. In order to manage effectively, managers
need to have an open and positive attitude that focuses on solutions. They need a results-oriented management style. If they need structure and control, they struggled to succeed at managing a virtual team. These managers must also be effective communicators, both formal and informal. An ability to delegate and follow up is also critical. Managers need to embrace the change of virtual teams in the today’s world. To be successful, proactive managers lead and not just react (Cascio, 2000).

In an article by Montero (2004), effective remote management techniques are explained. Remote managers must provide specific, measurable and obtainable goals to their workers. The worker must clearly know the what and when about a project. Remote managers take more of a facilitator role then just oversight of the project. Also, communication cannot be stressed enough by a remote manager. Using various communication technologies can be used here. Workers need structure so defining hours to be worked, or the workday, must be specifically outlined (Montero, 2004). This also provided an appropriate window for communication. While communicating, try to obtain a balance of proper communications to avoid the appearance of pestering your workers. Managers need to have regular meetings to inform the workers of changes and new information. These meetings can be through telephone or video conferencing. However, there should be occasional face-to-face meetings which helped to build a social connection to the workers. The use of proper feedback and support for the workers is critical. If a worker faces a problem, prompt and appropriate support was be greatly appreciated and helped to build a bond. Additionally, rewarding excellent team performance is helpful in showing your workers they are greatly appreciated.

Research by Staples, Hulland, and Higgins (1999) studied the remote management of employees using the self-efficacy model. Self-efficacy is defined as a worker’s judgement of
their ability to perform a particular task (Staples et al., 1999). According to the study, experience, learning from others, environment, managed with feedback, and a positive emotional state are all factors that effect a worker’s self-efficacy (Staples et al., 1999). One hypothesis suggests experience and training is one way to increase a remote worker’s self-efficacy. This includes experience using information technology, and computer systems (Staples et al., 1999). The study suggests that to be successful, remote workers need managers who are good communicators. This includes using communication technologies effectively within the workgroup. It is also noted that team building, and social activities must be encouraged by remote managers. All these management practices can be learned, and the organization is responsible to provide effective training in these areas to its remote managers (Staples et al., 1999). Performance, job satisfaction, commitment, and lower stress levels resulted in a higher self-efficacy in the remote worker, which in turn, increases productivity. Virtual management of remote teams is becoming more prevalent in today’s work force. The new virtual workplace creates many challenges in managing and communicating within the work group. Increasing self-efficacy and realizing its importance in the virtual environment are keys to success (Staples et al., 1999). The fact that many of these factors are influenced by the manager, emphasizes the extreme importance of leveraging management efforts to improve remote employee performance (Staples et al., 1999).

Ziek and Smulowitz (2014) stated that the emergence of virtual teams has also facilitated a need for a new type of leadership. Virtual leaders must cope with different cultures, geographical separation and various time zones. Their main function is to aid and support virtual team members in order to meet goals and increase productivity (Ziek & Smulowitz, 2014). The focus of this research is on emergent leadership and how its traits relate to team effectiveness. Several competencies were identified to include; goal setting, communicating, facilitation, motivating,
mentoring and providing resources needed by the team and each individual worker (Ziek & Smulowitz, 2014). Setting clear and understandable goals, along with good communications are two of the most important traits a manager needed.

In the study by Ziek and Smulowitz (2014), 60 college students were broken down in 10 teams of six. These teams were assigned cases to work on and then graded for effectiveness. Each team was secretly monitored as they proceeded to see if any leaders emerged from each team. It was found that of the 60 students, 20 leaders had emerged. After surveys were completed by each student, it was shown that the emergent leaders were the ones who had communicated frequently within the team (Ziek & Smulowitz, 2014). Not only did they communicate frequently, but their communications such as emails were longer and more in-depth. The emergent leaders, after all scores were tallied, scored above average in many of the competencies or traits described above (Ziek & Smulowitz, 2014). Also, those emergent leaders who scored the highest in each competency generally led teams who graded out as more effective. As the use of virtual teams increases, leaders who have or display these competencies should be selected to manage the virtual groups. It is recommended that assigned managers should recognize emergent leaders in their teams and delegate group tasks along with seeking their assistance in leading the virtual team (Ziek & Smulowitz, 2014). The study finds that the better a leader communicates, the more likely a team met its goals and effectively functioned together.

According to Johnson, Heiman and O’Neil (2001) virtual teams cross different time zones, geographical locations, and various diverse cultures around the world. Some of the benefits include hours that are flexible, especially if you are a teleworker. Virtual teams allow different division within a company to effectively function with one another. A savings of both work
hours and money are recognized due to a decrease in travel which ultimately helps reduce pollution in the environment. Physically disabled workers can also be incorporated into the workforce since they have the ability to work from home. One of the main cost savings and benefits can come in less real estate needed. If office space is decreased, rental costs go down and utilities were minimal. Companies who realize these positive attributes of virtual workplaces have embraced them (Johnson, et al., 2001).

**Challenges of managing a remote team.** In an article by Cascio (2000), it is stated that when first managing a remote team, most managers ask themselves, “How do you manage workers you can’t see?” This question defines the challenges of managing a virtual team. There is the cost associated with setting up each employee with the additional tools and equipment they would need. This includes equipment to support administration functions they would normally not need. First, there would be costs associated with technology needed to communicate effectively within the team and bridge the distance gap. This technology must work flawlessly to be functional and successful. Another challenge is for remote managers to engage in social interactions with their workers to combat fears of isolation and lack of trust. Without this, the team feels isolated and out of the loop, which can be detrimental to the organizational goals (Cascio, 2000).

According to Reilly and Lojeski (2009), it is easy to make assumptions about how remote workers understand or approach a problem or task. This phenomenon is called “virtual distance”. When teams communicate primarily through electronic methods such as email, virtual distance can occur. Virtual distance consists in three areas: physical distance (space and time), operational distance (psychological gaps in day-to-day problems), and affinity distance (emotional disconnect among workers). In physical distance, teams tend to communicate less the farther
they are geographically located apart. This can cause a sense of remoteness and can be corrected through better communications. Better communications can come from the use of several new technologies to decrease the communications gap. In the study by Reilly and Lojeski (2009), operator and affinity distances were of far greater concern. Operational distance can occur through an over use of e-mail. People need social interactions in communications. Otherwise, they tend to shut others out. This is easily fixed by management implementing programs that initiate social connections within the organization. In affinity distance, there is a lack of personal and social relationships amongst the workers. Management must cultivate, and the workers must retain these types of relationships in order to work in a successful and goal-oriented group. These relationships are the glue that holds virtual teams together.

In a study by Pauleen (2004), leadership of a group is extremely important and difficult. This difficulty is multiplied several times when it comes to virtual teams (Pauleen, 2004). Better team relationships tend to lead to better team outcomes. Building a relationship with a virtual employee is extremely tough while communicating, collaborating and socializing via electronic means of communication. Without the help of visual feedback, a virtual manager must be able to pick up slight nuances in communications with members of the virtual group. This way he or she can prevent miscommunications and trust issues among the team. A virtual manager must be able to build a cohesive and productive team in order to guarantee success (Pauleen, 2004). The study found that managers need to build personal relationship with each of his or her employees first, before addressing any team concerns (Pauleen, 2004). Effective personal relationships can result in enhanced team performance, effectiveness and information exchange, which can also result in enhanced team creativity, motivation and better decision making (Pauleen, 2004). Relationship building should be facilitated and encouraged throughout the virtual organization.
A three-step model was developed to provide positive outcomes between team leaders, members, and the organization (Pauleen, 2004). Step one is assessing the current condition of the virtual team. Step two is targeting relationship levels (leaders must identify and cultivate personal relationships within the team). Step three is developing strategies (select the proper way to communicate effectively to develop a positive relationship) (Pauleen, 2004). The challenges are many and virtual team members need to put the proper communications technologies to use, develop successful relationship models, and implement them. Learning from mistakes and applying those experiences only enhanced and improved team performance throughout the organization (Pauleen, 2004).

Pazos (2012) studied the relationship of team goals, conflict management, and outcome/satisfaction in virtual teams. The study investigates the effectiveness of conflict resolution in virtual teams and the unique problems presented due to geographical separation and difficulty in communicating effectively (Pazos, 2012). As the prevalence of virtual teams increase, their potential and efficiency must be guaranteed by understanding what drives their performance. In this study the potential for conflict and its resolution are emphasized. In order to increase team commitment, conflict among members must be kept to a minimum. This is especially difficult due to the hinderance in social conflict brought on by a lack of face-to-face verbal cues. It has been shown that people were more direct using electronic communications and say things they would generally not in a face-to-face setting (Pazos, 2012). This emphasizes one of the difficulties managing virtual teams, lack of verbal cues.

In the research by Pazos (2012), the input variable was the commitment to team goals by its members. It has been shown that an increase in commitment provides a more productive outcome (Pazos, 2012). The median was conflict management. This management could be pro-
active to prevent possible conflict or resolving a current conflict among the team members. Effective management prevents conflicts and increases outcomes and satisfaction among team members (Pazos, 2012). Of course, the outcome is the final variable. This is measured in both team performance, and satisfaction among team members. University students were broken up into teams of three or four students. Each group was assigned a team project. The team’s commitment, method of conflict resolution and the resulting outcome were all observed (Pazos, 2012). It was found that commitment to team goals directly correlated to member satisfaction and performance. Also, teams who displayed an emphasis on reducing team conflicts generally increased performance. However, an increase in positive conflict resolution did not necessarily indicate an increase in satisfaction. This may have been due to different teams that were made up from members of various nationalities. Meaning that, different cultures may handle conflict resolution in a way they feel comfortable with. These teams may also indicate a separate degree of satisfaction with the outcome (Pazos, 2012). In the end, it was shown that effective team resolution generally has a positive impact on team performance and satisfaction. Emphasizing that leadership needs to address conflict resolution and in virtual teams it presents and even tougher challenge.

An article by Pollitt (2006) described a training session on role playing involving virtual teams. A remote team can provide opportunities for organizations to become flexible while exploring new global markets. Generally, this type of dynamic results in innovation and cost saving to the company (Pollitt, 2006). Although there are several positives to virtual teams, they can also bring challenges to management such as motivating teams member to become cohesive and productive. Remote workers feel left out of the loop and become suspicious of other team members if team communication is poor. The success of these virtual teams is largely tied to
proper management (Pollitt, 2006). The manager must understand there is a difference in managing co-located teams versus virtual teams. He must understand and identify with each virtual member to avoid misunderstanding or feelings of exclusion. Effective communication is the key to success (Pollitt, 2006).

An exercise was performed by Pollitt (2006) which consisted of isolating managers of two teams formed from the attendees. One manager was communicating frequently with his team while the other took time to read the parameters before communicating. It was found that no matter what either manager did, the teams were confused when they saw the other team acting differently and questioning whether they were proceeding correctly themselves. This exercise identified the importance of not only communicating effectively within the team but building a relationship among members can be critical.

During this training, it was stressed the importance of developing techniques that are effective in communicating with remote workers. Also, a virtual organization must identify best practices to ensure team effectiveness and performance. By putting oneself in the shoes of remote workers, a manager can identify the struggles they may go through. Above all, communicating is key (Pollitt, 2006).

Remote managing and teams being managed remotely are becoming commonplace in the global workplace (Gerke, 2006). Some challenges a remote manager faces in remote management are:

- How to get acquainted and really know the remote employee.
- How to communicate effectively.
- Recognize group problems in a timely manner.
• How to measure performance of the team.
• Make timely decisions.
• Best way to build a cohesive team.
• Ensure every remote worker is focused on team goals.

In order to be successful, the remote manager must be able to develop and cultivate relationships by using effective communication methods. He must also be able to overcome the above challenges while maintaining the focus of group success (Gerke, 2006). Relationships must be built between manager and employee as well as employee to employee. This can be tough since chance encounters are impossible, and a lack of visual cues makes it difficult to communicate effectively while being co-located with employees. So how does one build these relationships? Whenever possible schedule face-to-face meetings, on conference calls take a few minutes out to socialize, and make sure to stick with commitments you have made to your employees (Gerke, 2006). Another key is to find out which communication methods are appropriate for each employee. They may include email, voicemail, or a simple phone call.

In the article by Gerke (2006), the four steps of developing team dynamics were discussed. The first stage is building a team foundation by establishing goals and how each member fits into the team. The second deals with conflict. What steps need to be taken to avoid and confront conflicts within the group. The third step is finding a normal environment for the team to thrive in. This is where adjustments are made to avoid misunderstandings and conflict among team members. The fourth step is all about performance and cohesion within the team. A cohesive and satisfied team member tends to be highly productive. In this stage, the manager needs to know when to get involved or just let workers take the initiative in day-to-day operations. Micro-managing can be detrimental to a team that is working at a high level with minimal supervision.
In order to be a great remote leader, a manager must build relationships, communicate effectively, and learn to delegate properly while constantly measuring performance of the team (Gerke, 2006).

According to Castle (2009), there are several challenges to virtual teams beyond the technical communication difficulties encountered. In order to build an effective virtual environment, socialization needs to take place among team members. Visual communication cues are important when socializing. These cues tend to be non-existent in a virtual team (Castle, 2009). It takes longer, but these socialization problems can be resolved and eventually the team can bond. Team members need to identify the different personalities within the team. Identifying each personality and developing the correct way to communicate with a particular member is crucial (Castle, 2009). Trust issues are another challenge that must be addressed. When you have no face-to-face communications within the team, it can be difficult to develop trust with one another. Each virtual team member must exhibit competence and integrity while dealing with each of his co-workers. This can also be stressed by the organization, hiring only candidates for the team that can exhibit these traits. Also, the organization needs to encourage an environment where all members can communicate freely in order to build trust in one another and work in a safe environment (Castle, 2009).

Virtual teams have proven to be extremely valuable to organizations in today’s global economy. In order to take advantage of this valuable asset, companies must provide management that aligns with the virtual environment. Managers must be able to communicate effectively with each team member, helping to avoid conflicts and misunderstandings within the team (Castle, 2009). In order to enhance communications, the manager and organization must be well versed in the technologies available and implement them correctly to overcome the barriers involved in
virtual team communications (Castle, 2009). Misunderstanding is a major complaint of virtual teams. If a team works to build a trusting environment, are managed correctly, and build a bond with one another, misunderstanding can be avoided (Castle, 2009).

In a study by Piccoli, Powell, and Ives (2004), effectiveness of managerial controls was tested and observed. In this study, 51 students were broken down into groups of three or four. The teams were given projects and observed. Most studies to date have found that virtual teams seem to do better when they are self-directed. While co-located teams tend to do better under direct managerial control. In this experiment, the researchers were testing and documenting the results of both controls on separate groups.

It was found that team satisfaction was higher in the self-directed teams. However, performance of the teams was basically the same in self-directed and direct managed teams (Piccoli et al., 2004). The flexibility of self-direction in teams leads to greater adaptability and a more rewarding experience, leading to higher team satisfaction. Just as in society, being directly managed and controlled tends to lead the worker’s satisfaction levels lower and can result in negative behavior (Piccoli et al., 2004). The researchers recommend that organizations that plan on building virtual teams in the future pay particular attention to team controls and management (Piccoli et al., 2004).

Helms and Raiszadeh (2002) state that if a company is to be successful, managers of virtual teams must adapt to different approaches in supervision. There are five key areas in managing virtual teams effectively. These areas are, managing teams, people, information, processes, and facilities (Helms & Raiszadeh, 2002). While managing people, a manager must trust their virtual workers. Even when they are not in sight, there needs to be complete trust between workers and their manager. The manager who is successful also must have established skills in managing co-
located teams. In managing information, the manager needs to communicate effectively with his virtual team. This includes making sure employees are kept up on company policies and news. They must also be available to step in and make decisions when conflicts arise. Team collaboration is a must while managing virtual teams. Companies support this management key by providing collaboration software. With this platform, workers can electronically discuss projects, company news, strategies, and conflicts with one another and their virtual manager (Helms & Raiszadeh, 2002). The meaning of managing processes comes down to designing and implementing processes for the virtual team. The virtual manager must be able to control day-to-day processes, measure the results, and evaluate the effectiveness of the team (Helms & Raiszadeh, 2002). The last key area of management is facilities. In the virtual world, facilities include technologies, office furniture, supplies and tools commonly used in a virtual environment. The everchanging communications technologies required must be selected and implemented properly by the virtual manager and organization. Virtual team needs have come a long way, from facsimile and phone calls to the internet, email, and video conferencing. As these technologies continually evolve, organizations must evolve with them and take advantage of each new platform and the benefits they provide. The future of virtual teams continues to increase, as an organization overcomes the drawbacks, and challenges they present, they can take advantage of the flexibility, mobility and cost savings they present (Helms & Raiszadeh, 2002).

While selecting virtual team members, human resources needs to look for a few qualities (Johnson et al., 2001). A successful remote worker must be self-motivated with the discipline to get the job done. They also must be accountable to not only themselves, but the team as well. Above all, they must work well with others and be flexible, willing to give and take while working within the team (Johnson, et al., 2001). Members of a newly formed virtual team should
be brought together to meet one another face-to-face in the beginning. They need to discuss and understand the goals of the team. In their first meeting, steps to socialize the group should be taken. This is the point where trust was formed among team members and management. Trust is critical in virtual teams. Each member must know that the other member pulls his own weight and completes tasks on time and correctly (Johnson et al., 2001).

Teams who do not communicate effectively have problems understanding project goals and the steps necessary for completion. Each team member must make an effort to respond to all correspondences from co-workers in a timely manner. Each team member must be taught how to use technologies correctly in order to communicate with one another effectively. When to make a phone call, send an email or perhaps schedule a conference call should be obvious to each team member depending on the type of message they are relaying. Virtual teams who are provided appropriate training can overcome the challenges of electronic communications, distrust amongst the team, and stress present in a virtual environment (Johnson et al., 2001). Organizational support, proper management, successful people, and the tools necessary are all factors that go into building a successful virtual team (Johnson et al., 2001).

“Training the man” (2003) provides insight on Prudential’s move to a virtual work environment. It was decided that the Customer Relationship Management group would be transformed in order to build its relationships with customers. They decided to provide communication technologies and train employees to work in a virtual environment (“Training the man”, 2003). Recognizing the need for a virtual workforce was the first step. Computer and phones were incorporated into the plan and given to employees working from home. This allowed workers to do the same amount of work with less travel. Employee satisfaction went up and team success soon followed (“Training the man”, 2003). Their initial start-up showed
promise, but there were areas that needed improvement. Prudential decided to hire a consultant firm to help them refine their processes and policies. Training on communications and team building was provided, along with support for the emotional problems workers encountered while adapting to the new virtual environment (“Training the man”, 2003). This resulted in better team communications, trust, and a decrease in misunderstandings and conflict. Prudential was ultimately able to increase business at less cost while providing an increase in satisfaction among its customers (“Training the man”, 2003).

**Technology in virtual teams.** Hunsaker and Hunsaker (2008) explain that one differentiating feature of virtual teams is technological mediation. Many communication technologies have been introduced recently, with interactive technologies leading the way. E-mail is the most common, but teleconferencing/videoconferencing, groupware and project management software are becoming increasingly common. These technologies allow for virtual teams to communicate effectively regardless of location. While technology is great, there are some drawbacks. It can be difficult receiving immediate feedback while sending e-mail or calling an unanswered cell phone. Also, the ability to communicate clearly can suffer without visual feedback when corresponding electronically. The imperfections of technological communications can lead teams to feel isolated and a lack of importance to the organization. Successful leaders must know how and when to match technology with the problem at hand. Email, video conferencing, phone conferencing, and face-to-face communications can be effective if applied correctly (Hunsaker & Hunsaker, 2008).

Graham, Daniel and Doore (2016) completed a study to determine if educators are preparing workers to succeed in virtual teams. It was found that business educators were teaching problem solving and co-located team work. However, students were not taught the social skills necessary
to work in teams. Some of the problems found were emphasizing individual achievement over group achievement, assigning students to team projects without first teaching the interpersonal skills necessary to be successful, and assigning unstructured problems to teach something seen in a real business environment. This is also true in computer science and information systems, which does not prepare students for the technical skills necessary to work in a virtual team. It is showed through the study that increased technical skills result in higher virtual team performance. Students need to be taught how to communicate, collaborate and exchange ideas using today’s technology in virtual teams. These technologies include, but are not limited to, e-mail, video conferencing, google calendar, instant messaging and groupware. In other words, if our students are going to compete in an ever-increasing virtual workforce, they would need to be properly trained by our universities and other institutions of higher learning. This only happens if those educators take note and tailor offerings to meet these future challenges and constantly evolve with the business environment. Business also needs to provide proper training to the managers and their teams. If this is done, organizations reap the benefits of virtual teams.

In another study, Dube and Marnewick (2016), found that continued development of communications and virtual meeting technologies has increased the effectiveness of managing remote teams. This use of technology allows teams and management to make instantaneous decision while reducing travel and accommodation costs to the organization. This technology also proves useful to a manager overseeing several groups of geographically dispersed employees (Dube & Marnewick, 2016). In fact, effective communications may be the most important aspect of managing remote teams. Making use of technologies such as email, texting, voicemail and remote meeting software helps virtual teams achieve goals and deliver customer orders on time (Dube & Marnewick, 2016). In the study, it is suggested that communications
technology should be the number one consideration while forming virtual teams, it should be the pillar on which to build (Dube & Marnewick, 2016). The use of such technology also helps to provide a cohesive team atmosphere and to enhance transparency between management and workers.

Virtual teams require a variety of abilities, skills, and knowledge. To hone employee skills, and abilities requires increased knowledge. The correct training needs to be identified and provided (Wesner, 2008). Workers need training on how to work in a virtual environment. This would include introducing technology and the proper way to use it while functioning in such an environment (Wesner, 2008).

Most research in this area stresses the cost savings in travel, lodging, and class expense while trying to train workers today. This is where virtual training becomes an extremely cost-effective alternative. Employees would no longer miss extra work days while traveling to and attending classes at a remote location. Using virtual training allows for many geographically dispersed employees to be trained at the same time. Employees need to have a certain technical aptitude in order to effectively use the required software packages and computer hardware. This can be done by carefully screening applicants for the requirements necessary to take advantage of this type of training. Above all, an organization needs to analyze, select and provide the proper training to meet the requirements of the workgroup (Wesner, 2008).

A worker with greater knowledge is able to apply it and increase performance on the job. A successful virtual training program starts with what training needs are require? Are the workers capable of receiving a virtual class? These are a few of the questions that need to be answered (Wesner, 2008). An effective virtual training program can be developed. Providing highly skilled and trained employees at a lower cost than conventional training provides (Wesner, 2008).
A study done by Beranek and Martz (2005) intended to show the effect of relationship training on virtual teams. Would relationship training increase a team’s ability to communicate effectively? It seems that the virtual employee who receives relationship training showed an improvement in communications skills (Beranek & Martz, 2005). Companies are using virtual teams to gain an advantage over its competitors in the global marketplace. A team that effectively communicates tends to become more cohesive and productive (Beranek & Martz, 2005).

Lack of visual and social cues tends to hamper virtual teams while communicating with one another. The telecommunication technologies today are designed to help provide a cost effective and successful way in which virtual teams communicate. These technologies include the world wide web, voice over IP, internet, Skype, virtual private networks and various meeting software packages (Beranek & Martz, 2005). Face-to-face meetings natural provide groups a way to communicate effectively, become cohesive and increase production. Computer aided communications are designed to provide virtual teams a means to become equally effective. Virtual teams tend to take a little more time to develop versus co-located teams, but eventually over time they can become as cohesive and effective as their co-located counterparts (Beranek & Martz, 2005).

In the study, it was shown that relationship training teamed with computer enhanced communications allows the virtual team to communicate effectively much quicker versus no relationship training. A computer-based meeting software was used that allowed for virtual meetings and a way for team members to leave messages and communicate with one another. Several groups were formed with half receiving relationship training and the other half none. As expected, the team who received the training formed a bond and became productive in a shorter
time frame. As a team becomes cohesive and communicates effectively, members tend to show a higher degree of satisfaction. This increases trust and job performance while decreasing turnover and even sick days. As virtual teams become more pervasive, it makes sense to not only provide effective management, but the training necessary to ensure virtual team success (Beranek & Martz, 2005).

According to an article by Morris (2008), the virtual workplace’s human interaction can be enhanced by technology and its proper utilization. The virtual team has slowly made its way into business worldwide. With the right support, training, and insight a virtual team can be just as effective as a co-located team (Morris, 2008). Virtual teams allow companies to access different viewpoints and a breadth of knowledge around the globe. Accessing this expertise within hours not days or weeks. A virtual workplace has no bounds and is always available around the clock (Morris, 2008). Cost is one of the major benefits of a virtual workplace. Travel is one of the major expenses where cost savings can be as much as 33 percent (Morris, 2008). With the decrease in travel, a company reduces its carbon footprint while becoming a greener corporation. The savings in lodging and lost work days, due to travel, must be considered as an additional benefit.

There are basic abilities virtual managers and workers need in order to be successful. Since most communication is done through technology, virtual teams must be comfortable with technology, having the ability to use and contribute on a conference bridge, and video conferencing session. They must also be able to influence people from a distance and build/maintain virtual relationships. Working independently, problem solving, and dealing with management from afar are also traits required of virtual workers (Morris, 2008).
Human resources must select the right people to work in virtual environments. They must have excellent people skills, willing to build relationships from afar while developing a sense of trust and cohesion with other co-workers (Morris, 2008). The organization must also employ effective hardware and software technology platforms, training each member on the use in order to leverage its positive outcome on team communications. Both virtual and co-located teams need purpose (Morris, 2008). The only difference is a virtual team needs a leader who is able to communicate the purpose and goals, while motivating and impassioning all member to buy in (Morris, 2008). If the leader is able to forge a relationship with each individual virtual worker, he would be able to build a team that is cohesive, motivated, trusting, satisfied, and productive (Morris, 2008).

Morris, Marshall and Rainer (2002) state that trust is necessary for virtual teams to become successful. It is also noted that with increased trust within a virtual team comes individual satisfaction in the group. Appropriate medium of communications, personalities of team members, and different cultures have an impact on effective communications. It has been shown that satisfaction in communications systems used, results in personal satisfaction among virtual team members (Morris et al., 2002). Increased satisfaction can result in better performance, low employee turnover, and overall commitment to the company (Morris et al., 2002). In the study performed by Morris et al. (2002), several hundred surveys were sent out to individuals who use information technology systems in a virtual environment. All data was collected anonymously and the results supported that an increase in member satisfaction and trust results in virtual member satisfaction. It was found that the proper selection of information technologies used to communicate has a direct effect on virtual team trust, satisfaction, and performance (Morris et al., 2002).
Summary

While reviewing these articles, studies, and research papers it became clear that our workforce is moving toward virtual teams. This became evident in almost every article. In order to be successful, we need to teach and upgrade the skills of both management and employees. There are basic skills necessary to manage a team of co-located workers. However, when managing virtual teams, additional skills are necessary. Learning to communicate effectively is a must. Managers must be able to make the objective and goals crystal clear to employees. A structured environment must be cultivated so virtual employees know the details of the projects assigned to them. Social skills come into play since it is extremely difficult to develop a team environment unless specific programs are put into place to promote professional and personal relationships amongst the team. Also, virtual team leaders need to be proficient and apply the technology available to promote communications amongst the team. This includes knowing when to apply these technologies and mix them with face-to-face meetings in order to enhance the team concept. Virtual teams are becoming increasingly commonplace and those workers and managers who improve the skills necessary succeed.
Chapter 3: Research Methodology

Research Approach

The methodology used in this research is detailed in this chapter. Verizon Wireline’s remote management of its western Michigan unit has been studied. Particularly, the effectiveness of procedures and systems in place. Data has been collected through anonymously delivered surveys. There are several areas that effect managing employees who are geographically separated from management. The proposed research examined several key components. Upon examination of the western Michigan unit, the effectiveness of Verizon Wireline’s management of virtual teams has been analyzed and evaluated. This section describes the data collected, collection procedures, target population/sample size, collection instrumentation/procedures, analysis/synthesis of data, and methodological limitations of this research.

Data Collected

The research includes both quantitative and qualitative data. Quantitative data collected came from a Likert type questionnaire that was given to the seven southwest Michigan workers and their manager. This questionnaire also included open-ended questions that allowed the participants to expound on some of the answers given.

These surveys questions honed in on areas of management such as communications, team cohesiveness, systems in place to manage a virtual team, technology used to perform the job and enhance communications, and judging performance by discussing objectives. Table 3-1 breaks down the data that was collected. The primary data collected is targeted at answering the primary and sub-questions outlined in Chapter One. All steps had been taken to provide comprehensive and unbiased data collection to ensure the error rate is as low as possible.
Table 3-1
Data necessary to answer research questions and method for collection

<table>
<thead>
<tr>
<th>Research primary and sub-questions</th>
<th>Data required to answer question</th>
<th>Data sources and collection method</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-question 1. What are best-practices identified in managing the remote employees?</td>
<td>Feedback from workers on what works. Is the training program effective? Are they given the proper tools and guidance to do the job? Interview manager on what he identifies systems, controls and communication methods that are successful.</td>
<td>Survey questions to workers and manager on what management tools and systems work using Likert scale questions and open-ended questions used to expand on answers given in the Likert scale survey. (Appendix C)</td>
</tr>
<tr>
<td>Sub-question 2. What areas of supervision suffer due to the geographical separation of manager and employee</td>
<td>Ask workers on areas of supervision they have the most problem. Do they receive clear and concise communications? Is there a social connection with management?</td>
<td>Survey using both a Likert scale and open-ended questions which can be used to expand any answers given on the Likert scale survey. (Appendix C)</td>
</tr>
<tr>
<td>Sub-question 3. What specific technologies could be leveraged to enhance communication within the workgroup</td>
<td>What technologies are currently in use. Do they work sufficiently? What new technologies are needed?</td>
<td>Survey using both a Likert scale and open-ended questions which can be used to expand any answers given on the Likert scale survey. (Appendix C)</td>
</tr>
</tbody>
</table>

Data Collection Procedures

Two sources had been used for data collection. There was a survey using open ended questions and Likert type questions. Using the technology available today, Survey Monkey was used. This helped alleviate the problems with hard copy surveys such as poor response, slow response, and errors transcribing from a hard copy to an analysis tool (Illieva, Barron, & Healey, 2002). However, being the sample size was so small, all seven remote employees were emailed the survey with a follow up phone call. An identical survey will also be given to the virtual team’s supervisor. The survey used had not been previously tested. This was the first time they were utilized in a research environment.
The survey was distributed to each of the seven remote employees located in Grand Rapids, Michigan and their supervisor located in Detroit. The survey URL was emailed to each recipient. Upon completion, the results were automatically recorded on the Survey Monkey website. There was a two-week time frame in which all surveys were completed and turned in. Since the researcher worked directly with each employee, of the eight surveys handed out, all eight were completed and turned in. All employees were advised that this survey was voluntary, and the process provided total anonymity.

Proposed Approach for Data Analysis and Synthesis

According to Green, Hughes, Small, Welch, Gibbs and Daly (2007), thorough analysis of the data gathered is crucial in providing good results. The data gathered through surveys and interviews, was analyzed to determine if the procedures and systems in place by Verizon Wireline are effective in producing the results desired. Quantitative analysis was performed and sorted into categories that indicate success in managing remote employees. Differential statistics were used, all data was then organized into figures showing percentages and tables indicating survey results. The collected data was used to help formulate the analysis. The completed analysis was then used in making recommendations to, and grading Verizon Wireline’s remote management program. All open-ended questions data was collected, analyzed was reduced, and conclusion drawn. (Miles & Huberman, 1994).

Methodological limitations

Verizon Wireline has several teams throughout the world that are managed by a geographically separated manager. The research proposed looked at just one of these teams. Many variables in southwest Michigan cannot be guaranteed to exist in other virtual teams. With
the small sample size, all remote workers were needed to participate in this study along with their assigned manager. This small sample size almost certainly guaranteed some amount of error in the findings.

Also, with the researcher being closely associated with the participants, a certain amount of bias may be present. Steps had been taken to ensure all responses are anonymous and that bias is kept to a minimum. This helped in reducing the impact of bias and provided transparent and ethical research. However, it is quite possible that if this same exact research, including questions, were to be conducted at other locations within Verizon Wireline, the results could be notably different.

**Ethical considerations**

All correspondence and surveys were completed on respondent’s personal time as required by Verizon Wireline. No corporate assets were used to gather data which was also a requirement by Verizon. Survey Monkey was used so that all results remained anonymous and invitations with the link along with a cover letter were sent to each respondent’s personal email account.

**Summary**

This chapter outlined the research approach, data collected, collection procedures, analysis/synthesis, and methodological limitations used. Upon completion of these steps, confirmation or recommendations were made to Verizon Wireline’s remotely managed employees, and their supervisor in the southwest Michigan unit.
Chapter 4: Data Analysis

Introduction

The researcher used Survey Monkey to collect the data used in this research. The survey was made up of nine Likert type along with three open-ended questions. The results and analysis were used to gauge the effectiveness of Verizon Wireline’s remote management of the southwest Michigan team. Seven team members and their supervisor were all sent invites via their personal email accounts. The cover letter was attached along with the link to the survey. Eight out of eight surveys were completed for 100% participation. All Likert questions were answered, however a few of the respondents chose not to answer some of the open-ended questions. The survey was designed to ask the following questions:

- What are best-practices identified in managing the remote employees?
- What areas of supervision suffer due to the geographical separation of manager and employees?
- What specific technologies could be leveraged to enhance communications within the workgroup?

The researcher used differential statistics to analyze the results of the Likert scale questions. A numerical value was assigned to each answer with “strongly disagree” equaling one, “disagree” two, “neither agree nor disagree” three, “agree” four, and “strongly agree” equaling five. The average was produced by throwing out the “neither agree nor disagree” results and then using the remaining responses in the computation. Percentages were also computed. The results were then analyzed and presented as either positive (agree) or negative (disagree) with the question.
Data collected

**Q1: Management encourages employees to take initiative when solving problems.** This survey question was designed to help the researcher understand the level of trust between management and remote employees. Refer to Table 4-1 and Figure 4-1 which helps visualize the results of this question.

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly agree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Agree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Disagree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
</tr>
</tbody>
</table>

Total Respondents: 8

| Strongly agree             | 37.50%    |
| Agree                      | 37.50%    |
| Neither agree nor disagree | 12.50%    |
| Disagree                   | 12.50%    |
| Strongly disagree          | 0.00%     |

Figure 4-1 Percentages question one.

The result of question one shows three strongly agree, three agree, one neither agrees nor disagrees, and one disagrees. Looking at the data, the calculations find that 75% of the respondents either agreed or strongly agreed, while 12.5% disagreed. Applying numerical values
to the results we can compute the average score. The average is 4.14 out of five. These results show that most respondents believe management encourages and trusts employees to take initiative on the job.

Q2: Working safely is emphasized while on the job. This survey question was designed to measure the effectiveness of a safety program on a remotely managed team. Refer to Table 4-2 and Figure 4-2 to help visualize the results of question two.

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly agree</td>
<td>62.50%</td>
</tr>
<tr>
<td>Agree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>0.00%</td>
</tr>
<tr>
<td>Disagree</td>
<td>0.00%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
</tr>
<tr>
<td>TOTAL</td>
<td></td>
</tr>
</tbody>
</table>

The results of question two show that five strongly agree and three agree. Looking at the data we find that 100% of the respondents either agree or strongly agree. Applying numerical values to the results and computing for average, the result is 4.625. These results show that all
respondents believe that management is serious about safety and that although this is a virtual team, they are able to administer an effective safety program.

**Q3: Company goals are understood and supported by employees.** This survey question will give the researcher an indication of how effective communications are between management and remote employees. Refer to Table 4-3 and Figure 4-3 which indicate the answers received.

### Table 4-3 Question three responses.

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly agree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Agree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Disagree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
</tr>
<tr>
<td>TOTAL</td>
<td>8</td>
</tr>
</tbody>
</table>

### Figure 4-3 Percentages question three.

Question three results show that one strongly agreed, three agreed, two neither agreed nor disagreed, and two agreed. Looking at this data it seems that 50% either agreed or strongly agreed and 20% disagreed. The average for all answers received that were either strongly agreed, agreed, or disagreed was 3.5. This indicates that respondents somewhat agreed that management
does a good job communicating company goals and that employees are buying in, but it is definitely not a strong indication.

Q4: Employees are kept up to date by remote manager on new corporate policies and news. This question helps the researcher understand how effective the remote manager is while communicating with their employees on a daily basis. Review Table 4.4 and Figure 4.4 in order to better understand the results of question four.

Table 4.4 Question four responses.

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly agree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Agree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Disagree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
</tr>
<tr>
<td>TOTAL</td>
<td>8</td>
</tr>
</tbody>
</table>

Figure 4.4 Percentages question four.

The results of question four shows that one strongly agrees, three agree, one neither agrees nor disagrees, and 3 disagree. The data shows that 50% of the people either agreed or strongly agreed and 37.5% disagreed. The average of the respondents who either agreed or disagreed is 3.29. This result indicates a split among respondents, perhaps indicating that the manager has a
good relationship and communicates more effectively with some employees and perhaps not so much with others.

**Q5: Management continually encourages workers to perform well, providing feedback, as necessary.** Question five helps the researcher judge the relationships built between manager and employees. Table 4.5 and Figure 4.5 provides a graphic indication of the results from question five.

### Table 4.5 Question five responses

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly agree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Agree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Disagree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
</tr>
<tr>
<td>TOTAL</td>
<td>8</td>
</tr>
</tbody>
</table>

### Figure 4.5 Percentages question five.

Results of question five indicated one person strongly agreed, two agreed, three neither agreed nor disagreed, and two disagreed. Again, throwing out “neither agreed nor disagreed” in our computations we find that only 38% agreed and 25% disagreed. The average was 3.4 out of 5.
These results indicate poor communications between management and the remote worker. This could be a result of a lack of face-to-face communication.

**Q6: Teamwork is encouraged to promote cohesiveness.** This question is designed to measure the cohesiveness of the team and measures taken to develop it. Table 4.6 and Figure 4.6 provide a visual indication of the results from question six.

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
<th>RESPONSES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Strongly agree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Agree</td>
<td>37.50%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Disagree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
</tr>
<tr>
<td>TOTAL</td>
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</table>

Table 4.6 Question six responses.

Figure 4.6 Percentages question six.

Question six results shows two strongly agree, three agree, two neither agree nor disagree and one disagree. Looking at the data, the researcher found 62.5% either agree or strongly agree while 12.5% disagree. Applying numerical values to the results, throwing out the “neither agrees nor disagree” and computing the average we get 4.0 out of 5.0. These results indicate that the
majority agree the team is cohesive and management takes the steps necessary to promote team unity.

**Q7: Technologies utilized in communication between management and employees are current and effective.** Question seven will indicate the efficiency of communications between team members and if communication technologies used are up to date and relevant. Refer to Table 4.7 and Figure 4.7 for a visual breakdown of question seven results.

### Table 4.7 Question seven responses.

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
<th>RESPONSES</th>
</tr>
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<tbody>
<tr>
<td>Strongly agree</td>
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</tr>
<tr>
<td>Agree</td>
<td>50.00%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Disagree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
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<tr>
<td>TOTAL</td>
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</tbody>
</table>

### Figure 4.7 Percentages question seven.

The results of question seven show one strongly agrees, four agree, one neither agree nor disagree, and two disagree. Computations show that 62.5% agree or strongly agree and 25% disagree with the statement. The average came to 3.57 out of 5. These results indicate that
communications and the technologies used within the workgroup are adequate but may need some improvement.

Q8: Employees are provided necessary equipment and tools to complete a job task properly. Question eight provided the researcher an indication of remote managements dedication to provide tools and equipment along with the training necessary for proper use. Table 4.8 and Figure 4.8 indicate the results obtained.

<table>
<thead>
<tr>
<th>ANSWER CHOICES</th>
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<tr>
<td>Strongly agree</td>
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</tr>
<tr>
<td>Agree</td>
<td>25.00%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>50.00%</td>
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<tr>
<td>Disagree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>0.00%</td>
</tr>
</tbody>
</table>

Total Respondents: 8

The results for question eight were one strongly agree, two agree, four neither agree nor disagree, and one disagree. The results were 37.5% agree and 12.5% disagree. The average equaled 3.75.
The results indicated that employees in the remote workgroup generally felt that tools and test equipment along with proper training is somewhat lacking.

**Q9: Training is provided to keep employees informed and current on newly installed systems and equipment.** Question nine is designed to show how quickly and often employees are notified of major changes in the work environment. Table 4.9 and Figure 4.9 visually indicate the results.

**Table 4.9 Question nine responses**

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<th>ANSWER CHOICES</th>
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</tr>
<tr>
<td>Agree</td>
<td>0.00%</td>
</tr>
<tr>
<td>Neither agree nor disagree</td>
<td>62.50%</td>
</tr>
<tr>
<td>Disagree</td>
<td>12.50%</td>
</tr>
<tr>
<td>Strongly disagree</td>
<td>25.00%</td>
</tr>
<tr>
<td><strong>TOTAL</strong></td>
<td></td>
</tr>
</tbody>
</table>

**Figure 4.9 Percentages question nine.**

Question nine results were five neither agree nor disagree, one disagree, and two strongly disagree. The results show 0% agreed and 37.5% disagreed. The average was 1.3 out of 5.0.
This question strongly indicates that training on new equipment and systems is deficient, which is an area management needs to address.

**Q10 What are the greatest challenges the team faces today when performing assigned tasks? Explain.** Six of the eight respondents answered this open-ended question. The intention of the question was to invite other employee’s viewpoint on what areas need to be confronted. Below are a few of the responses:

- “There is a lack of technical training, and management does not understand the challenges employees face getting work completed.”
- “Upstream organizations and remote management most of the time do not fully understand the tasks and challenges faced by subordinates.”

The majority of respondents that replied to question 10 felt adequate training was a problem. There were a four that felt management was out of touch with the day to day challenges their remote technicians faced. It seems that training and management communications/awareness are two items that need to be addressed by Verizon remote managers.

**Q11 How effective are communications between team members and remote management? What technologies would you like to see corporate introduce to enhance communication and improve job performance? Explain.** Seven of eight respondents answered question 11. The question was intended to judge the effectiveness of communications within the team. All respondents indicated technologies are available to enhance communications. However, their complaint seems to be that management is not communicating effectively and often enough. Below are a few of the responses:

- “The technologies from email, to cell phones, to video conferencing, and most other forms of communications are available for communication to be effective. Management
fails to utilize them to their full potential. I believe that it is the mindset of management that prevents effective communications.”

- “I think there could be more communication between direct manager and the team. Weekly meetings might help.”

The results from question 11 clearly indicate a problem with communications between management and the remote team. The technology is there, but the remote manager needs to make a conscious effort to communicate with the remote team effectively and more often.

Q12 Would you consider the team cohesive; working together on common goals?

Would you change anything to enhance team dynamics? Question 12 helps measure the cohesiveness of the remote team. Seven out of eight respondents answered this question. A few of the responses are listed below:

- “Yes, if you are in the correct clique. Have them work with each other on common projects to develop a closer working relationship.”

- “Cohesive yes. Working together on common goals, I have to disagree. I would change who works with whom so that every employee acquires a broader knowledge base, this way employees learn to accomplish different job goals, as there is a lack of technical training.”

The responses indicate that the team does exhibit some cohesiveness while working together on common goals is lacking. It is indicated that there are certain cliques within the workgroup that need to be broken up. This is difficult when the manager is remote. With increased communications and direct contact more often, perhaps this can be resolved.
Summary

The information gathered in this chapter will be used to formulate a conclusion on the effectiveness of remote managing the Verizon Wireline’s southwest Michigan unit along with recommendations in chapter five.
Chapter 5: Summary, Conclusions, Recommendations

Summary

The nine Likert type questions in this chapter were written as statements. Each statement was graded as disagree, strongly disagree, neither agree nor disagree, agree, and strongly agree. Each of these categories was then assigned a numerical weight from one to five, on a scale of one being strongly disagree up to five equaling strongly agree. When the averages were computed, “Neither agree nor disagree” was thrown out and the answers remaining were used to calculate the average. A calculated average closer to five would be an indication toward agreeing and closer to one would be an indication toward disagreeing. The percentages were also computed and included in the analyzed results. These questions were designed to measure the following:

- Trust between management and remote employees
- The effectiveness of the safety program
- Communications between manager and his remote employees
- The remote manager’s communication effectiveness and regularity
- The type of relationships between the employees and manager
- Cohesiveness of the team
- Technology utilized and training provided
- Proper equipment and tools provided

The open-ended questions in this chapter were designed to cultivate feedback and ideas from each employee. The areas covered were, challenges the team faces, how effective communications are within the team, and cohesion/teamwork within the group. Ultimately,
questions asked on the survey were used to drill down and answer the three questions from chapter one:

- What are best practices identified in managing the remote employees?
- What areas of supervision suffer due to the geographical separation of manager and employees?
- What specific technologies could be leveraged to enhance communications within the workgroup?

Statement one: Management encourages employees to take initiative when solving problems. This survey question was designed to help the researcher understand the level of trust between management and remote employees. In reviewing the data, 75% of the respondents either agreed or strongly agreed, while 12.5% disagreed, and the average computed was 4.14 out of 5. These results show that most respondents believe management encourages and trusts employees to take initiative on the job.

Statement two: Working safely is emphasized while on the job. This survey question was designed to measure the effectiveness of a safety program on a remotely managed team. Reviewing the data, 100% of the respondents agreed or strongly agreed, and the average was 4.625 out of 5. These results show that all respondents believe that management is serious about safety and that although this is a virtual team, they are able to administer an effective safety program. This indicates that remote management effectively communicates what is expected and the goal of providing a safe work environment.

Statement three: Company goals are understood and supported by employees. This survey question gave the researcher an indication of how effective communications are between management and remote employees. One half of the respondents either agreed or strongly
agreed, while 20% disagreed, and the response to the question was an average of 3.5 out of 5. This indicates that respondents somewhat agreed that management does a good job communicating company goals and that employees are buying in, but definitely not a strong indication. Perhaps remote management has stronger relationships with some employees than others resulting in mixed communications among team members.

Statement four: Employees are kept up-to-date by remote manager on new corporate policies and news. This question helped the researcher understand how effective the remote manager is when communicating with his employees on a daily basis. The results were 50% either agreed or strongly agreed, while 37.5% disagree, with an average of 3.29 out of 5. Perhaps indicating that the remote manager has a stronger relationship and communicates more effectively with some employees and perhaps not so much with others. Obviously, this deficiency is something that can be corrected.

Statement five: Management continually encourages workers to perform well, providing feedback, as necessary. Question five helped the researcher judge the relationships built between manager and employees. The results confirmed 38% either agreed or strongly agreed, and 25% disagreed. The average computed was 3.4 out of 5. These results indicate suspect communications between management and the remote worker. This could be a result of a lack of face-to-face communication with employees, which is crucial to building relationships and trust.

Statement six: Teamwork is encouraged to promote cohesiveness. This question is designed to measure the cohesiveness of the team, how well they work together, and possible measures taken to develop it. 62.5%, of the respondents either agreed or strongly agreed, and 12.5% disagreed with an average of 4.0 out of 5. These results indicate that the majority agree the team is cohesive, and management takes the steps necessary to promote team unity. Also, it may
indicate that the remote members possess personal characteristics that are found in cohesive teams.

Statement seven: Technologies utilized in communication between management and employees are current and effective. Question seven was used to indicate the efficiency of communications between team members. Also, communication technologies used are up to date and relevant. The respondents who either agreed or strongly agreed was 62.5% while 25% disagreed. The average came out to 3.57 out of 5. These results indicate that communications and the technologies used within the workgroup are adequate but may need some improvement.

Also, the use of a certain technology may not be appropriate for the intended message.

Statement eight: Employees are provided necessary equipment and tools to complete a job task properly. Question eight provided the researcher an indication of remote management’s dedication to provide tools and equipment along with the training necessary for proper use. The responses showed 37.5% either agreed or strongly agreed with 12.5% disagreeing. The average equaled 3.75 out of 5. The results indicated that employees in the remote workgroup generally felt that tools and test equipment, along with proper training, are somewhat lacking. It seems tools, test equipment, and training are areas that needs to be addressed by the remote manager.

Statement nine: Training is provided to keep employees informed and current on newly installed systems and equipment. Question nine is designed to show how quickly and often employees are notified of major changes in the work environment. None of the respondents agreed and 37.5% disagreed with this statement. The results when computing the average was 1.3 out of 5.
This question strongly indicates that training on new equipment and systems is deficient. Obviously training on newly installed equipment and systems is an area management needs to address. This is something that must come from remote management at the corporate level.

Question 10: What are the greatest challenges the team faces today when performing assigned tasks? Explain. Six of the eight respondents answered this open-ended question. The intention of the question was to invite employee viewpoints on what areas need to be addressed. A few of the responses are listed below.

- “There is a lack of technical training, and management does not understand the challenges employees face getting work completed”.
- “Upstream organizations and remote management most of the time do not fully understand the tasks and challenges faced by subordinates”.

The majority of respondents that replied to question 10 felt adequate training was a problem. There were a few that felt management was out of touch with the day-to-day challenges the remote technicians face. It seems that training and management communications/awareness are two items that need to be addressed by Verizon Wireline’s remote managers. Verizon corporate also needs to address this need and provide steps and policies corporate wide.

Question eleven: How effective are communications between team members and remote management? What technologies would you like to see corporate introduce to enhance communication and improve job performance? Explain. Seven of eight respondents answered question 11. The question was intended to judge the effectiveness of communications within the team. Two of the responses are listed below.

- “The technologies from email, to cell phones, to video conferencing, and most other forms of communications are available for communication to be effective. Management
fails to utilize them to their full potential. I believe that it is the mindset of management that prevents effective communications”.

- “I think there could be more communication between direct manager and the team. Weekly meetings might help”.

All respondents indicated the technologies available to enhance communications are available. However, their complaint seems to be that management is not communicating effectively and often enough. The results from question 11 clearly indicate a problem with communications between management and the remote team. The technology is there, but the remote manager needs to make a conscious effort to communicate with the remote team effectively and more often.

Question twelve: Would you consider the team cohesive, working together on common goals? Would you change anything to enhance team dynamics? Question 12 helps measure the cohesiveness of the remote team and how well they work together. Seven out of eight respondents answered this question. Two of the answers are listed below.

- “Yes, if you are in the correct clique. Have them work with each other on common projects to develop a closer working relationship”.

- “Cohesive yes. Working together on common goals, I have to disagree. I would change who works with whom so that every employee acquires a broader knowledge base, this way employees learn to accomplish different job goals, as there is a lack of technical training”.

The responses indicate that the team does exhibit some cohesiveness but working together on common goals is lacking. It is indicated that there are certain cliques within the workgroup that need to be dissolved. This is difficult when the manager is remote. With increased
communications and direct contact more often, perhaps this can be resolved. Also, workers within the remote workgroup need to feel open and secure enough to address this with both management and their co-workers.

All of the data collected will be used to present conclusions and specific recommendations on specific steps needed to resolve problems and endorse those best practices identified that work. There are a few areas that have been identified continually by respondents. Emphasis will be on these problem areas and those parties who need to address them.

**Conclusions**

For the most part, Verizon Wireline’s southwest Michigan unit functions quite well. They have a robust and successful safety program that was highly regarded by members within the team. Remote management also has done an adequate job in trusting and encouraging the remote team. Also, communications technologies used were up-to-date and effective. Another area of relationship building has shown to be somewhat successful. These are the things that Verizon Wireline has done adequately. However, when working in a virtual environment, companies need to take conscious steps to continually improve team building, communications, and individual relationships with all of their remote employees.

A virtual workforce creates many challenges while managing and communicating with each virtual team member (Staples et al., 1999). Many of the responses indicated that communications and relationship building could have been better. Managers need to hold meetings regularly, using the appropriate technology, and occasionally need face-to-face meetings in order to build relationships with each of their employees (Montero, 2004). The building of personal relationships when first forming a virtual team allows for enhanced team performance, effectiveness, and information exchange (Pauleen, 2004). This is where Verizon Wireline could
do a better job. Many peer reviewed articles in chapter two emphasize the need for effective communications, using appropriate medium for the intended information, and as often as necessary to inform and receive feedback from the remote worker.

The other major problem that needs to be addressed is training. Verizon Wireline employees indicated that training on new systems, and test equipment provided, is basically non-existent. Virtual teams require a variety of abilities, skills and knowledge (Wesner, 2008). Introducing new technology and the proper way to use it while functioning in a virtual environment is critical (Wesner, 2008). Training on relationship building is also one way to increase the team’s ability to communicate effectively, allowing teams to become more cohesive and productive (Beranek & Martz, 2005).

There were two main areas that showed deficiency needed for successful management of virtual teams. The area of training is probably the most obvious and the area of virtual team communications. The researcher, being a member of the southwest Michigan unit, definitely agrees with these findings. An increase in training on new equipment and systems along with relationship building would increase the abilities of team members to communicate, effectively do the job, and meld into a cohesive, and productive team. It must also be noted that some respondents indicated a lack of proper tools and test equipment. This is a problem that can exist in both co-located and virtual environments. This problem will be addressed in recommendations, but it is important to remember, this is not a problem that is exclusive to the virtual environment.

**Recommendations**

Success in a remote environment needs managers who are great communicators. These managers need to use communication technologies effectively. Successful team building,
providing social activities and conflict resolution are all management practices that can be learned (Staples et al., 1999). The human resources group along with hiring managers need to carefully screen and select management applicants who have the ability to build relationships and communicate effectively with people. Once hired, Verizon corporate must develop a training program that teaches their remote managers the skills that have been shown effective in remote management. This training must be initially provided to new managers and refresher courses given every two years. This type of training can be developed and disseminated by the training group via Verizon’s training website.

A three-step model was developed to produce positive outcomes between remote management and team members (Pauleen, 2004). The first step requires the remote manager to assess his virtual team. Areas such as effective communications and conflict resolution can be evaluated. The manager must then target each individual team member to communicate with and build a relationship which is step two. Step three, which is the last step, is to develop a strategy for each team member and select the proper communication medium to use when contacting each individual. Some workers communicate better through email, others, a phone call, and in some instances, face-to-face is appropriate. The manager must pick the medium and how often to use it. Some workers need a more direct approach, while others prefer a hands-off method. Again, this three-step process can be documented and refined by corporate then distributed down to each individual virtual manager for execution.

The other major problem identified was training. Training remote teams can include relationship training, training on new equipment/systems, proper use of communication technologies, and the proper use of tools and test equipment. It is obvious by the safety program, that if the company desires, they can effectively train their virtual teams in these areas. The
training program starts with Verizon corporate offices; every year there is a delegated training budget. The training budget needs to be increased to provide for vendor training on newly installed equipment and systems. As a member of the southwest Michigan unit, the researcher has verified that vendor training is basically non-existent; rather remote employees are required to rely on a technical support group. This group is often located offshore and presents other challenges such as effective communications and a lack of trust while working together. Each worker needs a certain level of competency on repairing equipment that only comes from vendor training. This type of training needs to be emphasized and provided by Verizon corporate. Many of the other types of training could be developed and provided via Verizon’s training website.

With the emergence of virtual teams and their popularity, perhaps training students in local colleges on how to communicate, collaborate and exchange ideas in the virtual environment could be developed and provided. Training in the use of communications technologies could also be stressed along with socializing in a virtual environment (Graham et al., 2016). The sooner training is provided, the more effective the virtual worker can become in a shorter period of time.

One last item to address is the lack of appropriate tools and test equipment. As systems become more intricate and evolved, proper test equipment must be provided in order to make repairs in a timely manner. The southwest Michigan unit provides support for Verizon Wireline’s fiber network in the area. The equipment is constantly updated and new test equipment is necessary in order to restore outages in a timely manner. Especially if they are FCC reportable. If outages become reportable and are not restored quickly, large fines can be levied against Verizon. Verizon corporate provides a budget for new equipment every year. The researcher, who is member of the southwest Michigan unit, verifies that first to request new equipment each year are the ones who get it. If a manager is not in the loop, year after year he can miss out on
acquiring new equipment and tools. This has been the case in the southwest Michigan unit. Corporate needs to monitor the requisition of equipment and make sure all sites receive an appropriate amount of monies to purchase test equipment and tools for that site.

This research was done on a single virtual site of seven workers and one supervisor involving Verizon Wireline’s southwest Michigan unit. The researcher verifies that the team is built up of members who work well together and support one another selflessly. However, this may not be the case throughout Verizon. Additional research should be done either on a whole Verizon Wireline territory, such as the Midwest or Eastern United States. This way the researcher can gauge the effectiveness and problems associated with managing Verizon Wireline virtual teams. Additionally, a researcher may wish to identify what steps corporate takes to develop and support the virtual teams scattered throughout the United States and perhaps the world.
References


Appendix A

Research permission letter

January 31, 2018

Paul.Sewell@verizon.com
Paul Sewell
537 South Court Avenue
Gaylord, MI 49735

Re: Paul Sewell: Research Project for Central Michigan University

Dear Paul,

Verizon has granted you permission for you to perform the requested research in conjunction your Master’s degree program with Central Michigan University. You have agreed to abide by the following stipulations:

- Participating in this project is completely voluntary for your co-workers. Anyone who agrees to participate are to be advised that this is voluntary and the project is not being sponsored or endorsed by the company. You may not retaliate against a co-worker who does not want to participate.
- All discussions about the project need to be conducted during non-work hours
- No company equipment or email addresses may be used for anything relating to this project. Any surveys sent to co-workers should be sent to personal email addresses.

Please feel free to contact me at 908-559-3712 if you have any further questions.

Regards,

Marissa Ruggiero
Verizon Communications
Manager - HR Business Partner
Basking Ridge, NJ 07920

O +1 908-559-3712 | M +1 908-625-9764
marissa.ruggiero@verizon.com
Appendix B

Survey Cover Letter

Dear Participant:

My name is Paul A. Sewell and I am a graduate student at Central Michigan University. For my final project, I am examining the remote management of Verizon employees in the southwest Michigan unit. Because you are an employee in this unit, I am inviting you to participate in this research study by completing the attached survey.

The following questionnaire will require approximately fifteen minutes to complete. There is no compensation for responding nor is there any known risk. In order to ensure that all information will remain confidential, please do not include your name. Copies of the project will be provided to my Central Michigan University instructor and Verizon management employees upon their request. If you choose to participate in this project, please answer all questions as honestly as possible and return the completed questionnaires promptly by clicking on the survey link found at the end of this letter. As stipulated by Verizon, the survey must be completed on your personal time and no company equipment or email addresses are to be used. Participation is strictly voluntary and you may refuse to participate at any time.

Thank you for taking the time to assist me in my educational endeavors. The data collected will provide useful information regarding the effectiveness, and efficiency of employee remote management in Verizon’s southwest Michigan unit. Completion and return of the questionnaire will indicate your willingness to participate in this study. If you require additional information or have questions, please contact me at the number listed below. Please feel free to e-mail me if you would like a summary copy of the study.

Please note that if you are not satisfied with the manner in which this study is being conducted, you may report (anonymously if you so choose) any complaints to the MSA Program by calling 989-774-6525 or addressing a letter to the MSA Program, Rowe 222, Central Michigan University, Mt. Pleasant, MI 48859.
Sincerely,

Paul A. Sewell  
248-763-1624  
sewel1pa@cmich.edu

Dr. Calvin A. Lathan III  
latha1ca@cmich.edu

Please click the following link <insert survey URL> to access this web-based survey.

Thanks for your participation.
## Appendix C

### Research Survey

Please indicate your opinion by selecting one of the five options to the questions listed below.

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</tbody>
</table>

Strongly agree | Agree | Neutral | Disagree | Strongly Disagree

1. *Management encourages employees to take initiative when solving problems.*
   - ( )
   - ( )
   - ( )
   - ( )
   - ( )

2. *Working safely is emphasized while on the job.*
   - ( )
   - ( )
   - ( )
   - ( )
   - ( )

3. *Company goals are understood and supported by employees.*
   - ( )
   - ( )
   - ( )
   - ( )
   - ( )

4. *Employees are kept up to date by remote manager on new corporate policies and news.*
   - ( )
   - ( )
   - ( )
   - ( )
   - ( )

5. *Management continually encourages workers to perform well, providing feedback as necessary.*
   - ( )
   - ( )
   - ( )
   - ( )
   - ( )

6. *Teamwork is encouraged to promote cohesiveness.*
   - ( )
   - ( )
   - ( )
   - ( )
   - ( )
7. Technologies utilized in communication between management and employees are current and effective.
   
   () () () () () ()

8. Employees are provided necessary equipment and tools to complete a job task properly.
   
   () () () () () ()

9. Training is provided to keep employees informed and current on newly installed systems and equipment.
   
   () () () () () ()

10. What are the greatest challenges the team faces today when performing assigned tasks? Explain.

11. How effective are communications between team members and remote management?
    What technologies would you like to see corporate introduce to enhance communications and improve job performance?

12. Would you consider the team cohesive, working together on common goals? Would you change anything to enhance team dynamics?