Differences between Male and Female Communications and Conflict Management Styles in Virtual Teams

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ABSTRACT

Previous studies have identified the difficulty of communicating in virtual teams. The lack of media richness, or opportunity for using non-verbal cues, leads to misunderstood communications and may limit the development of trust. Studies have also shown that males and females are socialized to communicate differently. Males use communication in teams to establish dominance and position while females use it to establish relationships and gain trust. In this study, we looked at communications and conflict management styles by gender. Males logged significantly fewer communications than females, focusing communications on the task at hand. Females communicated more often and were more likely than males to participate in social communications. Additionally, males were more likely than females to use a dominating conflict management style while females were more likely to use a compromising or avoiding conflict management style.

Keywords: virtual teams, gender, communications, conflict management

INTRODUCTION

Advances in technology have changed how teams function. It is no longer necessary for teams to meet face-to-face (F2F) with advances in technologies such as email, chat capabilities, video conferencing, and group support systems (GSS), today's teams are often virtual. Virtual teams, composed of individuals

who are often geographically dispersed, come together and disband quickly depending upon the organization's needs (Jarvenpaa & Leidner, 1999).
Previous studies have identified the difficulty of communicating in virtual teams because of the lack of media richness (Watson-Manheim & Belanger, 2002). Many forms of computer-mediated communication are more difficult because of the absence of nonverbal cues such as body language, gestures, and voice tone and inflection. Studies have also shown that males and females interact differently in team settings (Furumo & Pearson, 2007; Furumo, 2009). Males use communication in teams to establish dominance and position while females use it to establish relationships and gain trust. In this study, we focused on communications and conflict management style differences for males and females interacting in virtual teams.

HYPOTHESIS DEVELOPMENT

Studies of interpersonal conflict management have utilized a theoretical framework comprised of two underlying motives – concern for self and concern for others (Desivilya, H. and Eizen, D., 2005). Within this theoretical framework, five major conflict management patterns have been identified. Two styles, *integrating* (high concern for self and others) and *compromising* (moderated concern for self and others), are known as cooperative conflict management styles (Rahim, 1983). Other styles include, *dominating* (high concern for self and low concern for others), *obliging* (low concern for self and high concern for others), and *avoiding* (low concern for self and others). The integrative and avoidance conflict management styles are thought to be polar opposites since one involves high regard for all parties concerned and one regards low concern for all involved. The integrative conflict management approach, involves solving problems through the collaboration of team efforts. The avoiding conflict management approach involves ignoring problems.

Since females are more likely to use communication in teams to establish relationship and trust (Furumo, 2009), they may be more likely to utilize an *integrating* (high concern for self and others) or *compromising* (moderated concern for self and others) style of conflict management. And males, who use communication in teams to establish dominance, may be more likely to use a *dominating* (high concern for self and low concern for others) conflict management style. Therefore, we developed the following hypotheses to guide our research.

> Hypothesis 1: Females will be more likely to utilize an *integrating* or *comprising* conflict management style in virtual teams.
>
> Hypothesis 2: Males will be more likely to utilize a *dominating* conflict management style in virtual teams.

Numerous research studies have identified differences in male and female communication styles (Aries, 1996; Aries & Johnson, 1983; Briton & Hall, 1995; Burgoon & Dillman, 1995; Dovidio, Brown, Heltman, Ellyson & Keating, 1988;

Holmes, 1995; Kette & Konecni, 1995; LaFrance & Henley, 1994; Rogers, 1989; Tannen, 1990a; Tannen 1990b; Troemel-Ploetz, 1991). When working with others, women's communication goals focus on gaining trust, developing consensus, and establishing relationships with others (Troemel-Ploetz, 1991). On the other hand, Men's communication tends to be more task-oriented. Tannen (1990a) suggests that this may be the result of differences in socialization. Males are socialized to communicate in a "one-up, one down" style in which the goal is to win the discussion. Females, on the other hand, are socialized to communicate in a "rapport-talk" style in which the purpose is to discuss and understand others' perspectives. Research has also shown that females enjoy participating in virtual teams more than males (Berdahl & Craig, 1996; Lind, 1999; Savicki, Kelley, & Lingenfelter, 1996). Given these assumptions, the following hypothesis was developed.

Hypothesis 3: Females are more likely than males to participate in social communication in virtual teams.

Hypothesis 4: Male communication will focus on task.

METHODOLOGY

In this study, a quasi-experimental design approach was used. Participants in the study were upper- and graduate-level college students enrolled in business courses at two different universities, the University of Hawaii at Hilo and Niagara University. Students spent the semester working on three deliverables including an icebreaker activity and two cases in which students were asked to provide written recommendations of how they would handle a business problem.

At the onset of the experiment, participants were asked to complete the ROCI-II scale developed by Rahim (1983). The scale identifies the extent to which an individual uses a particular conflict management style when dealing with conflict. The scale utilizes a 5-point Likert-type response scale anchored on one end with strongly agree and the other with strongly disagree.

Students used the Google Wave product to communicate with team members. Prior to the start of the experiment all participating students were provided orientation about the Google Wave product. They were required to use a Gmail account sign-on to access the system. Students were free to use existing Gmail accounts or create new ones for the purposes of the virtual team. A dedicated technician was available to answer questions and walk participants through the registration steps. Once the students were registered, the icebreaker activity allowed them to familiarize themselves with the technology while getting to know fellow team members.

After completion of both the second and third deliverables, communication threads were evaluated and communications were coded: task related, coordination related, or socially related.

RESULTS

Of the original 115 subjects assigned to teams, 5 were eliminated from the study because they dropped the course in which the virtual team activity was being completed. Table 1 provides a summary of the breakdown of participates by sex and location.

Table 1. Participant Counts

	Location		
Sex	**Niagara University**	**University of Hawaii**	**Totals**
Male	35	13	48
Female	27	35	62
Totals	62	48	40

ANOVA tests were performed to determine whether males and females use different conflict management styles. There were significant differences between the two in terms of three of the five conflict management styles. Table 2 shows that females were significantly more likely to use an *avoiding* and a *compromising* conflict management style. Males were significantly more likely to use a *dominating* conflict management style.

Table 2. ANOVA Results
Conflict Management Styles

Conflict Management Style	**Male n = 48 Mean/SD**	**Female n = 62 Mean/SD**	**F**	***df***	**Sig.**
Integrating	4.20 (.41)	4.31 (.39)	2.10	$F_{1,109}$	.150
Avoiding	2.86 (.77)	3.31 (.80)	9.11	$F_{1,109}$	.003
Dominating	3.29 (.75)	2.76 (.70)	14.45	$F_{1,109}$	.000
Obliging	3.54 (.40)	3.61 (.47)	0.58	$F_{1,109}$	.449
Compromising	3.73 (.56)	4.05 (.45)	10.99	$F_{1,109}$	.001

These results provide partial support for hypothesis 1 and full support for hypothesis 2. While females were more likely to use a *compromising* style, they were not more likely to use an *integrating* style.

A review of the communication threads showed that females had significantly more communications during the virtual team experience than males did. For females, the average number of Task and Coordinating posts was higher for deliverable 2 but social communication posts increased for deliverable 3. Tables 3 and 4, below, provide the details. Hypotheses 3 and 4 are supported therefore.

Table 3. ANOVA Results
Number of Communications – Deliverable 2

Communications	**Male** **n = 48** **Mean/SD**	**Female** **n = 62** **Mean/SD**	**F**	***df***	**Sig.**
Task	1.73 (1.61)	3.40 (2.92)	12.747	$F_{1,109}$	.001
Coordinating	2.08 (2.09)	4.19 (3.64)	12.840	$F_{1,109}$	.001
Social	0.48 (1.01)	1.11 (1.57)	5.921	$F_{1,109}$	.017

Table 4. ANOVA Results
Number of Communications – Deliverable 3

Communications	**Male** **n = 48** **Mean/SD**	**Female** **n = 62** **Mean/SD**	**F**	***df***	**Sig.**
Task	1.79 (2.32)	2.71 (2.12)	4.675	$F_{1,109}$	.033
Coordinating	1.65 (2.53)	3.39 (2.56)	12.662	$F_{1,109}$	.001
Social	0.77 (1.40)	1.58 (1.77)	6.757	$F_{1,109}$	.011

CONCLUSIONS

In this study, male and female virtual team members were compared. As previous research indicates, males have a more dominant conflict management

style and communicate less often than females. When they do communicate, it is generally with regards to task and coordination as opposed to establishing social relationships. Females, on the other hand, communicate more often. They do focus on task and coordination; however, they are far more likely than males to participate in social communications. This is not a surprise since previous studies have found that females tend to use communication to establish relationships rather than to show dominance.

In line with this, is the fact that males are more likely to use a dominating conflict management style than females. Females tend to prefer that team members work collaboratively in an environment where members compromise when conflicts arise. Females were much more likely however to use an avoiding conflict management style which may limit the effectiveness of the team. When conflict is avoided, alternative ideas may not be considered.

It should be noted that this study has several limitations. First, students were used as proxies in the study. While one review article of virtual team studies identified that 90% of published articles utilize student teams as research subjects (Powell et al., 2004), it is recognized that there may be difficulties generalizing these findings to other settings.

Despite its weaknesses, this study provides evidence that males and females interact differently in virtual teams. In a setting such as a virtual team, where media richness is limited, it is important for managers to be aware of inherent differences in the way males and females interact in teams.

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