

CHAPTER I

INTRODUCTION

I first became interested in the dynamics of tech talk when I worked for seven years as a technology analyst for a research and consulting firm in Silicon Valley, California. My job was to analyze technical and market trends in advanced computer technologies such as speech recognition, virtual environments, and pen-based computers. The job required me to read technical and business journals, attend lectures, interview technologists, and attend technical conferences and demonstrations of new products. The goal was to summarize this information in business briefs and presentations for clients interested in learning how the technologies were changing and how the market for them was unfolding. I enjoyed watching new industries develop and learning about fancy new gizmos, like speech recognition systems that could process voice-based rather than keyed input, and virtual environment systems in which users could explore imaginary terrain using dazzling new devices such as sensor-laden gloves and head-mounted displays.

The job suited my fascination with new technology and dovetailed with an ability to cull a large amount of information and present it succinctly to a business audience. Yet, over the course of my work, I began to notice some interesting and sometimes disturbing interaction patterns among both business analysts and technology developers in these industries. I began to observe that face-to-face discussions and debates about technologies and their markets were not always conducted on cordial terms. I was surprised to observe that sometimes technical “experts” who knew the technology better than others in the conversation were not always “heard” in the same manner as other people. They seemed to have difficulty finding acceptance for ideas, even if what they

expressed was acknowledged as accurate in the very next conversation, or the one immediately prior. I began to suspect that the reason they were having difficulty finding acceptance within a specific conversation had less to do with what they were saying than with how they were saying it. Yet I did not understand why they had difficulty succeeding when conversations turned from discussing a technology to jockeying for position. Sometimes such jockeying was done in fun, as a kind of game. Sometimes it happened during meetings or at technical conferences, in which the stakes were somewhat higher.

The following is a hypothetical example that contains sentiments that were prototypical of those I encountered at technical conferences while working in Silicon Valley. In a conference on hand-held, pen-based computers, someone asked the panelists a question containing the following sentiment, “How are we ever going to get grandma to use these things?” It occurred to me that such a question had far less to do with understanding how to increase the device’s market penetration and much more to do with sending certain signals to others at the conference about the questioner’s own abilities. The underlying subtext of the “question” seemed to be that someone like “grandma” was not a capable, prototypical user, whereas the questioner was. Further, it was somehow important to send that message to his peers in the audience. In one sentence he displayed his views about who was fit to use the tools and who was not. His sentence also noted which category he was in and offered an expression of alliance with others who held these views. The hostility in his voice and the packaging of his question about grandma “ever” purchasing them suggested that his interest in changing the industry’s approach to making the device was less than genuine and had more to do with forging his own identity as a legitimate member of a group of savvy pen-based computer users.

Yet it is interesting to ask, what if his interest was genuine? What if, for example, he worked for a company manufacturing hand-held devices and he really did want to increase the variety and type of users of these systems? What if his agonistic question

masked an earnest desire to have new and different users enjoy the fruits of pen-based computing? If this is the case, we might ask next, how does his choice of linguistic packaging affect his and others' general attitudes about who uses technology, who "should" use certain technologies, and how and whether they should be adapted for different users? Although these questions are larger than the dissertation can answer at this juncture, the hope is that we can examine such linguistic turns and discover at least their local consequences within and across conversations. By discovering and analyzing the mechanisms and dynamics of how these linguistic turns work, we can offer a theoretical lens that enables future studies to address larger questions, such as, how does what we say for social reasons influence how we think about creating new technologies or learning how they work?

Throughout the dissertation, we will refer to these type of sociolinguistic dynamics as performing technical affiliation. During such a performance, speakers display alignments to views about technology or techno-social culture. In the above example, the questioner was displaying alignment to the idea that most elderly women were at least unwilling, and by implication, actually unfit to use pen-based devices. He displayed to others that he was aligned to this viewpoint, and that since he was not an elderly woman, he placed himself in a category of those who are willing and capable of using such devices. In this sense, the questioner was able to build a certain amount of techno-social capital vis-a-vis those in the audience who respected and valued a savvy pen-based computer user. We will examine how performers display technical affiliation and how such displays allow them to accumulate techno-social capital in local contexts.

The concept of techno-social capital is adapted from Bourdieu's ideas about symbolic capital (Bourdieu 1977, 1991). According to Bourdieu, linguistic signs can be thought of as "goods destined to be given a price by powers capable of providing credit" (Bourdieu 1991: 77). Although such symbolic capital is often conceived as distinct from economic capital, and "lacking concrete or material effect," Bourdieu discusses that in

fact symbolic capital and economic capital are “perfectly interconvertible” (Bourdieu 1977: 178). Bourdieu points out that even the most minor exchanges, such as conversations between friends are influenced by how talk will be received by others (Bourdieu 1991: 77). People therefore try to “maximize the symbolic profit they can obtain from practices which are, inseparably, oriented towards communication and exposed to evaluation” (Bourdieu 1991: 77). Such an orientation is not necessarily conscious, but is rather a kind of “linguistic habitus” that provides a practical orientation towards what is acceptable to say (Bourdieu 1991: 77). To maximize linguistic profits, speakers will engage in a kind of self-censorship that influences “what it will be possible or not possible to say” (Bourdieu 1991: 77).

Similarly, we will be examining how speakers accumulate techno-social capital, which can convert forms of prestige into actual speaking rights and privileges. Although it might appear that such techno-social capital is “symbolic,” it actually operates in economic terms in that it produces tangible results. During a performance of technical affiliation, performer and audience negotiate appropriate expressions of alignment to technology and techno-social culture. Ratification of such expressions can accrue prestige or sanctions to the speaker. As Bourdieu points out, we will also investigate examples in which speakers engage in forms of self-censorship to anticipate the kinds of linguistic “profits” that may be conferred in local conversation (Bourdieu 1991: 77).

It is important to keep in mind that not every interaction within tech talk is a performance of technical affiliation (although it might be difficult to find conversations about technology that contain no performance-oriented alignments). In addition, not every performance is harmful or unbalanced. For instance, if a person is applying for a job in a company that uses a particular piece of software or computer operating system, then the candidate would do well not only to show her technical facility with the system, but also to demonstrate alignment to views about the technology. There are many scenarios in which performing technical affiliation does not facilitate social imbalances

between participants or interfere with deeper understanding of how technologies work. The negotiation between speakers that ensues when they become ensconced within a framework of performing technical affiliation is not necessarily a zero-sum game in which one “wins” at the expense of the other. Multiple parties within a performance can simultaneously accumulate techno-social capital.

For our purposes, however, this dissertation concentrates only on a certain sub-portion of tech talk in which the participants themselves mark the talk as “troubled.” We will see that certain kinds of performances of technical affiliation do cause social inequities and interfere with non-normative forms of expression. It is this sub-set of tech talk that the dissertation will explore. I am particularly interested in how interlocutors become caught up within what Bateson and Goffman call a social “frame” which influences subsequent interaction (Bateson 1972; Goffman 1974; 1997). According to this view, certain social signals are communicated that provide information about how a particular segment of talk should be interpreted (Goffman 1974; 1997; Bateson 1972). This dissertation will discuss the kinds of signals that speakers send to indicate that they are displaying alignments to certain ideas and beliefs. We can then closely examine sequences of talk to see how audience members respond to such performances and negotiate their outcomes. We will see that these negotiations may be complex. In Chapter VI on interruptions, for example, we will examine how participants try to interrupt these performances, often using meta-linguistic strategies that comment on the performer’s technique. In the conclusion of the dissertation, we will provide examples of how this frame may take hold even in groups that are not particularly “technical” but are nevertheless impacted by the dynamics of this social “frame.”

We will see that successful performers of technical affiliation are not synonymous with the “technical elite.” Those who are the most technically competent (as judged by factors such as their online role in the community, and general statements about how their peers perceive them) are not automatically the ones to initiate a performance nor the

ones who will always accrue the most techno-social capital. We will see that different types of participants often use such techniques to accumulate techno-social capital.

This dissertation takes a position similar to that of Jacoby and Gonzales who studied the interactional construction of expert-novice relationships in group meetings of a university physics team (Jacoby and Gonzales 1991). They discussed how expert-novice relationships between interlocutors do not necessarily correlate to “a priori macro-level social categories such as hierarchical status” (Jacoby and Gonzales 1991: 173). Using a conversation analysis approach, they showed how “the constitution of expert-novice in dynamic interaction is a more complicated, shifting, moment-by-moment reconstruction of Self and Other, whether within a speaker’s turn at talk or between speakers” (Jacoby and Gonzales 1991: 174). In their important paper, Jacoby and Gonzales note that at any given moment, “interactionally achieved identities are only candidate constitutions of Self and Other until some next interactional move either ratifies or rejects them in some way” (Jacoby and Gonzales 1991: 174).

Although their framework is similar in some respects to that discussed here, one caveat must be mentioned. This caveat about the term “expert” parallels Brubaker and Cooper’s objections about the use of the term “identity” (Brubaker and Cooper 2000). Brubaker and Cooper argue that if identity is as mutable, unstable, and constituted as many theorists suggest, then how does one know one “has” a particular identity at all (Brubaker and Cooper 2000)? Similarly, we might argue here that if what is defined as “expert” is not dependent upon macro-conversational factors (such educational background or hierarchical status) and differs from one interaction to the next, then the concept of “expert” becomes difficult to pin down.

How would we account, for example, for someone who is not considered to be saying something technically accurate when viewed at the macro-interactional level, but would nevertheless have their descriptions of a particular technology ratified as “expertise” in a micro-interactional encounter? One can be hopelessly “wrong” about

their explanation, but may nevertheless accumulate techno-social capital. When one dismisses the television show *Xena Warrior Princess* as inappropriate cultural material for technologists, and such an opinion is ratified within a conversation, can we rightly call this interlocutor an “expert” in techno-social culture? What if the very next conversation exalts *Xena* as perfectly appropriate material for such groups? For these reasons, the dissertation will speak cautiously about “expertise” and the construction of technological or techno-cultural “experts” in conversation. Rather, the dissertation will speak of speakers’ alignments to particular ideas, beliefs, and values as part of a quest to create visible identifications with certain groups. We will see that part of the difficulty in their quest lies in the fact that the domains of knowledge, realms of culture, and technical groups in which participants try to establish alignments are themselves ever changing.

The “Fieldsites”

While working in Silicon Valley, I became aware of social groups on the Internet called multi-user domains (MUDs). In 1995, Turkle reported some 500 MUDs in existence with a hundred thousand players worldwide (Turkle 1995). At the time of this fieldwork, a popular MUD Web site listed over 1500 public MUDs, excluding private MUDs or MUDs in progress that were not yet open to the community. MUDs are increasing in popularity, not only in terms of participating in existing MUDs, but also in terms of creating new MUDs. An increasing symbol of prestige in the MUD community is to be able to code and maintain a MUD of one’s own.

MUDs are online, computer-based communities in which people create textual descriptions of imaginary worlds and communicate by typing in text messages. People can traverse the world’s virtual geography by entering different MUD rooms, each of which contains a textual description (such as in the phrase, “You are in a pub with a long oak table. At the end of the room is a blazing fireplace and a black cat curled on a large

chair”). MUD participants assume a persona or character consistent with the MUD’s theme, which often revolves around medieval fantasy, science fiction, or television and film themes. People can chat and perform actions (such as waving hello or drinking a beer) that players can see. As with chat rooms, people from all over the world can exchange text messages in real time by connecting to MUDs over the Internet. Unlike many chat rooms, MUDs contain a permanent virtual geography that has been created by administrators who run the MUD (Cherny 1999). Administrators maintain the equipment for the MUD, pay the cost of running the MUD, set rules about who may participate, and determine whether someone’s privileges should be suspended if they break the MUD’s rules.

Participants may communicate with others in the MUD in multiple ways. Each type of communication command helps to create a sense of geographical and social space between participants. For example, participants in the same room may use the “say” command and everyone in the room will hear what is said. Participants may also “whisper” to others in the same room. Although people in the room will see the participants whispering, they will not know what is said. If participants wish to communicate privately (without others knowing they are speaking to each other), they can use a separate “send” or “page” command. Only the participants who send and receive talk via the “send” or “page” command will know that they are speaking to each other. Participants may also “emote” or “pose” actions, such as in the phrase “pose laughs” which the others will see as, “Patricia laughs.” The MUDs also offer public communication channels which can be viewed from anywhere in the MUD. Most of the data used in the dissertation is taken from MUD-wide, public communication channels.

When a person logs onto a MUD, they assume a character and write a description of that character which others can see. Participants will use this information to role-play fantasy stories. The game also assigns various values to different attributes of the character, such as her “strength” or “dexterity.” These values derive from the role-playing

game Dungeons & Dragons (D&D) on which many MUDs, including MUD A, are based. In D&D games, participants role-play (generally within medieval-themed story lines) and use dice and statistical tables to determine the outcomes of plots, such as imaginary battles between characters. To replicate this feature, MUDs use statistical software code to determine outcomes of battles both with other participants and with imaginary MUD characters.

As I learned more about MUDs, I was particularly interested in the fact that so many technologists, newbies and veterans alike, were addicted to them and received important socialization about how to behave in technical communities while interacting on them. MUDs are important sites of investigation because participants exchange normative ideas about technology, such as superior software coding practices and computer platform preferences. MUD administrators frequently make job connections through MUDs and showcase MUD programming experiences on their résumés. A young person's first exposure to computer code is often through MUDs, where they become expert players and are invited by administrators to change the MUD's underlying software code. Studying a social atmosphere for current and future technical professionals provides an excellent venue for examining how cyberspace participants negotiate and perpetuate normative beliefs and practices. I felt that a MUD would be an interesting fieldsite for understanding how identity displays might work within these environments, and analyzing what the consequences of the displays might be.

Although they are often populated by people in universities and technical companies, the situation is quickly changing as more high-school students and people not affiliated with computers and networking companies join MUDs and learn how to code. MUDs are also vital areas of theoretical interest because they highlight the processes whereby members gain access to the creation of cyberspace. Although MUDs tend to have more male than female players, the MUDs studied here are also of theoretical

interest because they contain respected female administrative staff who have contributed to the MUDs' technical underpinnings.

In a sense, calling MUDs "fieldsites" is problematic, not because they do not conform to some anthropologists' notions about what constitutes a proper, remote geographical fieldsite. But because transposing the term "fieldsite" directly to a MUD risks minimizing the broad and varied types of interaction that take place within and outside of MUDs. Such encounters are nevertheless part of MUD interaction. For instance, MUD participants in the two groups studied often met in person, on the telephone, over instant conferencing systems, and through email. They shared photographs of each other on Web pages and attended MUD conferences together. All of these encounters are part of the MUD participants' larger social space of interaction.

Calling a MUD a "fieldsite" tends to ignore these social spaces, often at the cost of smuggling in flawed theoretical assumptions about how online interaction works. We will discuss at length, for instance, how restricting the notion of the MUD to a bounded online "fieldsite" may lead to assumptions that members of the MUD community are anonymous to each other. As is evidenced by their interaction in other social spaces and media circuits, such an assumption may not be true. However, for convenience, I will speak of the two groups as the project's "fieldsites." The reader should keep in mind, however, that interaction between many MUD participants was in no way limited to participation on the MUD.

I initially consulted an online list of MUDs and read some of the MUD descriptions to see which kinds groups might be interesting to study. One of the earliest MUDs I visited was MUD A. I was fascinated by its original science fiction theme, which interested me more than the traditional, medieval-themed MUD. It was a complex world of various "races" (such as cyborgs and comfort women called "nymphos") with a cyberpunk, dystopic story line in which a nebulous, malevolent entity known as "The Company" ran business and cultural affairs. The action took place on a remote planet in

which each participant held jobs such as mining, operating a medical clinic, working at a pub, and selling weapons, among other tasks. As the fieldwork progressed, a radio and television station were also added. I was initially concerned about choosing MUD A because it had fairly recently been re-opened and was in a sense, a “new” community. I felt it might be risky to invest time in a place that seemed to have a limited number of participants online at one time.

I continued to look for other potential places, but I always found myself comparing every group to MUD A, and wishing it had one of MUD A’s fascinating characteristics, such as a more interesting story line, more imaginative use of online representations of space, and more cordial social interaction. In one MUD I visited, my character was killed off in the first few minutes of his life, before I could even find out who the head of the MUD was. I decided I wanted a more newbie-friendly environment since I was new to these societies and would need some assistance. I also believed it would be interesting to prove that even in cordial environments, participants could visibly become ensconced in displays of technical affiliation.

One of my major concerns was that MUD A typically only had about 20 players online at a time. Later, MUD A’s server was expanded and participation increased with as many as 30-40 participants online at a time. But in the early days of my research, I was concerned about being able to observe sufficient amounts of interaction. I experimented with joining larger MUDs which had over a hundred participants online at a time, but as one informant pointed out to me, it was paradoxically more difficult to absorb and process interaction and get a sense of how the community worked when hundreds of people were coming and going and communicating over numerous channels. Luckily, MUD A did eventually get a critical mass of followers and did achieve a sense of community over time.

My next task was to choose a comparison fieldsite. I was initially interested in comparing how certain forms of linguistic expression influenced access to the building of

personal spaces online. How did people get access to building “rooms” on MUDs, for instance, and how did their forms of expression and interaction influence this access? I chose a MUSH (MUSH Q) that seemed to offer a good comparison. MUSH stands for multi-user shared hallucination. MUSHes are similar to MUDs in terms of having a permanent geography, allowing communication, and enabling role play. However, traditionally, MUDs are more game-oriented, including an emphasis on automated battles with computer-generated monsters (also called hack ‘n slash games) whereas MUSHes tend to emphasize role-play and interaction. However these distinctions become quickly blurred when observing talk on MUDs and seeing MUSHers try to solve automated puzzles and other “games” on the MUSH.

Regrettably, after several months of time invested in studying MUSH Q, its traffic slowed down considerably, and with only a few people logging on now and again, it became untenable to stay. I was advised by informants that this is not an unusual pattern for MUD communities which see cycles of growth, expansion, and decline. For me, MUSH Q’s decrease in interaction created a renewed search for a comparison MUSH. I eventually found MUSH B, which was an established group that saw steady interaction throughout the course of a day. I began studying MUD A in the Summer of 1999 and concluded the major portion of fieldwork there in Spring of 2001. I began studying MUSH B in Spring 2000 and concluded most fieldwork about one year later. However, I continue to visit the sites from time to time because I miss daily participation in them and I enjoy being recognized by “old-timers” who remember my character and continue to maintain a friendship with me.

I initially selected MUSH B for comparison because it was similar to MUD A in that it was an online community with an array of imaginative spaces or “rooms” that participants could create. Both groups had a team of administrators who had responsibility for overseeing the groups’ various technical and social aspects. However, in MUD A, for the most part building spaces on the MUD required a formal position in

the MUD's administrative hierarchy. However, even this distinction is not completely hard and fast. In MUD A, once any participant reached a certain level, they were given an "apartment" for which they could write a description. In contrast, as is typical of many MUSHes, participants of MUSH B were given a small quota and could begin building spaces and objects very early on, and could link them to other rooms in the MUSH. MUSH B did not have a fantasy theme per se, and most interaction on the public channels and rooms did not involve role play, but rather regular chatting about people's lives, politics, technology, and culture, to name just a few topics.

MUSH B also fostered a very newbie-friendly environment that was welcoming to new participants who found help with their MUSH coding projects. MUSH B provided several special channels for discussing specific kinds of technical, software, and hardware issues. MUSH B also had administrative staff responsible for monitoring the channels and ensuring smooth interaction. Similarly, MUD A encouraged friendly interaction in several ways, such as by having formal policies that sanctioned unduly rude messages and offering a question and answer channel so that participants could find help when they became confused in the MUD or could not find the answers in help files. The question and answer channel was not only helpful to new participants to MUDs, but also to MUD veterans who were new to MUD A. Since MUD A operated slightly differently than other MUDs, many experienced players who were familiar with MUDs sometimes encountered difficulty when MUD A's operations did not conform to their expectations.

The purpose of choosing MUDs with differing access to creating spaces was to show that even in a group in which building privileges did not require moving through the administrative hierarchy, participants would have greater "access" if they performed technical affiliation in ways that individual participants and the community as a whole judged to be appropriate. Early in the research project, this focus was abandoned because it became difficult to trace how performing technical affiliation affected building privileges per se. In addition, the data revealed much more interesting and higher level

issues of other kinds of access, such as access to non-normative expression and access to techno-social capital within and across conversations. However, the selection of two groups that worked hard to provide a newbie-friendly environment did prove fruitful, because it showed that performances of technical affiliation and their associated negotiations did exist, even in environments that cultivate a friendly atmosphere. The data showed that performing technical affiliation even in cordial environments happened not because participants were perfectly anonymous to each other (they were not) but because performances form persuasive social frames within which participants become ensconced and feel compelled to respond to.

The two fieldsites selected are quite similar to other MUDs and to each other in that they are small (have several hundred members) and boast international membership. Although most participants are from the United States, other members hail from countries such as Singapore, Japan, Germany, Mexico, England, Ireland, and Canada. The transnational nature of the sites addresses Gupta and Ferguson's methodological and theoretical critique that anthropology's focus on co-located fieldsites has stunted investigation of transnational institutions and mass media studies (Gupta and Ferguson 1997a). Fieldwork is decreasingly limited to specific geopolitical areas, and is being seen as a flexible strategy for understanding the human condition in various social, political, and geographical predicaments (Gupta and Ferguson 1997a: 37). By studying "border-crossing" groups, we may broaden our understanding of how culture works in non-traditional settings (Gupta and Ferguson 1997b).

In terms of demographics, MUD A and MUSH B were similar, although according to administrative staff, MUD A seemed to have more teen-age participants than did MUSH B, which had a larger group of participants over thirty. Many of the participants in both communities were either college-age students or new entrants into computer and networking industries. Many participants were also MUD coder hobbyists who enjoyed the fact that the MUDs provided an environment to learn how to code and

improve their technique. Additional demographic details are provided in Table 1.1 below¹. Except where indicated, the administrative staff of MUD A and MUSH B provided the information.

	Date Opened	Total Number of Participants	Number of Regular Participants	Average Number of Participants Online	Female/ Male Ratio^a	Allows Multiple Characters
MUD A	January 1996	400	100	25-49	18%/ 82% ^b	No
MUSH B	Late 1997- Early 1998	643	200 ^c	23 ^d	22%/ 78% ^e	Yes

^aRefers to ratio of female- versus male-presenting characters, not participants' sex

^bEstimate based on random sample of logs collected during field study

^cBecause MUSH B allows each individual to have more than one character, this figure may be slightly high

^dEstimate based random sample of logs collected during field study

^eRatio applies to total number of participants

Table 1.1. Selected Demographic Information for MUD A and MUSH B

Data for the project is based on participation, interviews, and observation recorded in over 400 logs from MUD A and over 200 logs from MUSH B. Each log represents an online session time of approximately two to seven hours. Logs contained a dizzying array of interwoven interaction that included dialogue on several different public channels, conversation from the “room” one was in, as well as communication

with individuals, sometimes several at a time. An example of a raw log is enclosed in Appendix A. Throughout the study, generic pseudonyms are used in place of online names. This strategy was used to minimize associations between data presented here and particular persons in the communities studied. In a way it is logical to use pseudonyms to reduce chances of identification and protect informant's identities. As Kendall correctly points out, pseudonyms function less to maximize anonymity and more as personal nicknames that people may even use offline when they meet in person (Kendall 1998).

On the other hand, one could argue that online character names are already pseudonyms, since they are not participants' real names. A case might be made that when one eliminates pseudonyms from the presentation of material, incredibly crucial data is lost. This is especially true for projects interested in identity-making practices. As a hypothetical example, what might a person communicate by naming herself "LinuxGrrrrl"? Associating a technology with one's own online, gendered name is potentially a display of alignment towards that technology. Using a generic pseudonym, such as "Jane" robs the project of valuable data and neutralizes "Jane's" creative identity display. I decided, however, that trying to come up with clever permutations, such as "PenguinChick," (which uses the Linux advertising symbol of a Penguin) would defeat the purpose of using a pseudonym since they would be traceable to the original person and/or they would lack the original participant's inspiration. The reader should keep in mind, however, that the generic names in the data samples do not reflect the intense creativity of participants in terms of their personalized identity displays.

In addition to participation and observation, material from about forty-two interviews is included in the analysis. The average age of interviewees was between 22-24 years. The age range of interviewees was between 18-36. A few interviews were conducted in person and over the telephone, but most were conducted online. Interviewing participants online had definite benefits and drawbacks. On the one hand, online interviews provide a ready-made text document that did not require hours of

tedious transcription. Project cost and travel time could be minimized, and risks could be reduced for meeting unknown persons encountered on the Internet. In addition, for those participants who preferred some measure of anonymity vis-a-vis the researcher (although not necessarily vis-a-vis others in the community), online interviews could provide a buffer. Also, since participants could multi-task, online interviews generally tended to be longer because people became less fatigued during an online interview session.

On the other hand, multi-tasking could divert participant's attention away from the interview. As one interviewee put it (note that I am Patrick):

Patrick says, "So you have so much going on online. Did you find yourself multi-tasking during our interview?"

Mary says "Let's see...."

Mary says "I fed my son, gave peanuts to the 2 year old, helped my older girls through some math problems, had a stimulating argument about Pennsylvania politics, hired a staffer here, looked at some [code] submitted for [xxx], told [xxx] that the mods to the MUX channel code were an affront to the Gods and why, razzed 3 other people because they were simply there and answered 5 emails...is that a 'yes'?"

Patrick says "Wow!"

When participants multi-tasked heavily, it became more difficult to know whether the participant was still considering a question, or whether they had in fact become distracted and needed further prompting. The rhythm of interviewing was sometimes difficult to gauge online. Nevertheless, it proved advantageous for the study to have a logged record of responses typed in the participant's own words.

Life on the MUDs

My approach to fieldwork included creating two characters, a female on MUD A and a male on MUSH B. Although I used pseudonyms for the characters, each character description noted that in real life I was a researcher conducting a Ph.D. dissertation

project on online communication. The character biographies also provided information required by the University of Michigan's Human Subjects Projection Office regarding the purpose of the research, what I intended to do with the information, notification of logging, and contact information for myself and relevant academic and administrative personnel. I approached the head of both MUD A and MUSH B, explained my research and its purpose and told them that I would be logging conversations. One reason that researching MUD A and MUSH B appealed to me was because they were run as public spaces on the Internet, allowing anyone in the world to access, observe, and participate in community activities.

Both characters, whom I will call here Patricia and Patrick participated in community life, tried to assist others, and where possible, gave something back to the community such as holding down a steady job that provided crucial services or participating in community events that required a critical mass of participants. Both characters also made an effort to minimize invasiveness in community affairs. For instance, at one point during the fieldwork observations of MUD A, an unpopular character made a bid to take over the radio station. Pub employees on MUD A were distressed lest this character have such widespread control over a critical and public function on the MUD. They created a kind of "Save the Radio Station" campaign to outbid him. Since I was an employee of the pub, they asked for funds to help the campaign. The person trying to take over the radio station also asked me for money for his attempted coup. I declined in both cases so as not to influence the outcome of the community's politics. Avoiding such an intervention was not particularly difficult because I could claim researcher neutrality and a wish to obey the "prime directive." This is a reference to the *Star Trek* television and movie series in which the goal is to minimize interference in community affairs. Most of the participants in MUD A understood this principle and were disappointed but not surprised when I declined to assist either side.

However, one arena in which minimizing invasiveness did present challenges involved refraining from answering questions on the question and answer channel. After I had substantial experience doing fieldwork, I became able to answer novice questions about certain aspects of MUD A. But part of the research was to see if performing technical affiliation “incorrectly” made it difficult for people to find access to answers. Therefore, I was often torn between assisting the person, especially when they became frustrated at not receiving a proper answer, and observing the outcome of the question and answer interaction. One problem was that even by being a presence online and refraining from answering, I contributed to the “non-answer” status of the question. Often, when a person received an answer from one person, others started responding as well. Intuitively, I observed a kind of a question and answer inertia principle that one could potentially contribute to simply by not answering. I did sometimes answer questions, but tried to answer infrequently so as to observe the community’s dynamics regarding answering questions. Watching someone’s frustration build however, was quite difficult and uncomfortable in cases where I could assist.

In general, I tried not to be too loquacious on the MUDs, but I tried to interject some commentary both in an effort to participate and to remind participants that “the researcher” was on and observing interaction. I participated in the MUD’s ongoing affairs and special events. MUSH B, for instance, held contests such as egg hunts or pumpkin finding competitions. Winners would have this information added to their biographies by the staff running the contest. At one point, I won a pumpkin contest and this information was recorded in my biography. I was terribly disappointed when, during write-up of the dissertation, I logged on again and found that I had been away so long that my character’s biography had been erased. I was extremely upset to have to “start over” and lose this symbol of community participation and prestige.

In general, I became rather addicted to both MUD A and MUSH B, and often still miss participating in the communities on a day-to-day basis. A number of participants

exerted a great deal of time and energy to make the MUDs interesting by adding rooms, story lines, creating special events, and simply engaging in lively conversation. Many “regulars” could be observed spending a great deal of time on the MUDs, and I was often amazed to see that the same people who were there when I logged on were still going strong when I logged off, even at 4 a.m. East Coast time. Their commitment to the MUDs was so strong that it was often difficult to keep pace with them even though my main job was to MUD.

Participants MUDded from work and school, and often competed with others in the household for more computer time to MUD. I was interested to observe that contra Kendall, many of the participants were not particularly financially well off and did not have unlimited access to the Internet (Kendall 1998). Some of the participants expressed frustration that they had trouble paying utility bills and therefore would have to take a hiatus from the MUD. Other participants complained of having to share computers and Internet time with other members of the household. Teen-agers, for instance, expressed frustration that their parents “needed the computer” and they would have to log off. Sometimes school regulations also compromised a MUDder’s ability to stay logged on for an extended time. Nevertheless, many participants found ways to keep up a substantial presence on the MUD and contribute to its myriad social interactions.

I also elected to have a female character in MUD A and a male character in MUSH B. My initial intent behind this plan was to observe whether the female character had more difficulty with self-expression, sexual harassment, or other potentially gender-based issues with respect to the topic of the dissertation. The female character did experience some forms of sexual harassment whereas the male character did not. However, this line of data is not weaved into the dissertation because it happened infrequently and the instances in which it occurred did not take place during performances of technical affiliation.

Also of interest was the observation that participants of both groups tended to assume that the sex of one's character was the same as their "real life" sex, which may not always have been the case. For instance, I played a male in MUSH B and he seemed to be accepted as such based on how others treated and addressed him. I did not consciously try to use any kind of "male" behavioral characteristics to persuade others that my character was male. Interestingly, it appeared that participants of MUD A found it more offensive when someone played gender inconsistently, rather than playing a sex that did not match their real life person. One character who tried to "switch" their sex several times received quite a bit of ridicule for the practice. Again, while interesting, these topics belong to another research project and are therefore not discussed here.

A Different Kind of Role Play

This dissertation differs from studies of MUDs that concentrate on how individuals can use fantasy characters on MUDs to understand different aspects of the self (Turkle 1995). Turkle, for instance, discusses how people may use MUDs to work out personal problems and to experiment with characters who exhibit traits that they would like to develop (Turkle 1995). In discussing MUDs, Turkle was speaking of how people adopt an online persona different from their own in an attempt to transcend personal histories and recreate the self (Turkle 1995: 192). In contrast, this dissertation focuses on what MUD participants would characterize as "real life" talk, in which people share personal details and discuss topics that may or may not be related to the MUD, such as technology and contemporary culture.

Unlike MUD A, MUSH B was not a Dungeons & Dragons inspired fantasy community. Rather, MUSH B was an environment that encouraged learning, exchange of ideas about coding projects, and speaking about real life issues. Similarly, even though MUD A's major activities revolved around a science fiction world and D&D games, most

of the interaction on MUD A's public channels involved "real life" talk, rather than fantasy role play. Indeed the MUD A administrators had difficulty persuading MUD A participants to play the science fiction characters they had logged onto the game with. Although it may be true that some participants on MUD A and MUSH B created a persona quite different from themselves even when interacting on the "real life" chat lines, most people used those communication channels to talk about real world issues, opinions, and events in their lives. Although studying fantasy role play is an important project and reveals much about identity-making practices, this dissertation focuses on real world talk that occurs within as well as outside of MUDs.

However, it might be argued that even though this dissertation focuses on "real life" as opposed to online fantasy interaction, the data do show that performances of technical affiliation enable a kind of role play of their own. Similar to Turkle's reminder that "you are who you pretend to be," participants perform technical affiliation as a way of establishing membership in a group and in order to construct a sense of self vis-a-vis others (Turkle 1995: 192). Sometimes participants perform technical affiliation by aligning themselves with others in the conversation, and at other times they may align themselves in opposition to their interlocutors.

In a way, performers are also addressing a group that may not even be present within the conversation. Performances may be positioned toward what Anderson has called "imagined communities" (Anderson 1983). Although he was speaking about nations, his comments apply in this context as well. Anderson says that a political community is imagined "because the members of even the smallest nation will never know most of their fellow members, meet them, or even hear of them, yet in the minds of each lives the image of their communion" (Anderson 1983: 6). For Anderson, all communities larger than a village are imagined and distinguished by "the style in which they are imagined" (Anderson 1983: 6). This dissertation attempts to examine one social process that plays a role in imagining certain technical communities. We will see how

performing technical affiliation is both an attempt to align oneself to a community as well as a process that tries to create techno-social communities through the reification of certain beliefs and values. Since they involve real life opinions and alignments to ideas, participants might not consider such activities “role play.” Nevertheless, performing technical affiliation enables participants to display and emphasize certain identity aspects that may or may not directly correspond to their personal views.

Notes to Chapter I

¹Data about average number of online participants must be taken with a grain of salt, however. Being online did not necessarily mean one was intensely engaged in interaction. For instance, one way in which participants could perform technical affiliation was to stay logged onto the world even when “idle.” Although long-term idling was discouraged by staff, staying connected for long periods (days or weeks at a time in MUSH B), demonstrated to other participants that the “idler” had a stable computer system capable of staying up for long periods (as opposed to Windows-based systems which tended to crash more frequently). Idling could be seen as a type of prestige marker.