

SIGNS IN SPACE: AMERICAN SIGN LANGUAGE AS SPATIAL LANGUAGE AND
CULTURAL WORLDVIEW

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By

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Preface and Acknowledgements

“The very words we use incline us toward a particular view of the universe...The surface of the earth is shaped for each person by refraction through cultural and personal lenses of custom and fancy. We are all artists and landscape architects, creating order and organizing space, time, and causality in accordance with our apperceptions and predilections.”

- David Lowenthal, 1961

“Language is limiting...what we can see...in the spatiality of social life is stubbornly simultaneous, but what we can write down is successive, because language is successive.”

- Edward Soja, 1989

It is important and interesting that I begin this thesis with these two quotations. I enjoy using quotes from others because they often convey what I am desperately trying to say in a much better and more eloquent way than I could. However, it is also ironic that this thesis begins with quotations. Because this paper is about American Sign Language and the limitations (or broadening scope) of language, it is unfortunate that I had to confine this introduction to written English and could not use American Sign Language itself. Until we invent a video monitor small enough to fit onto a piece of paper in a thesis that can record and play back a person using American Sign Language as well as translate those signs into English, we will have to make do with written English.

The reason that I have chosen these quotes is significant. The first quote by Lowenthal marks the beginning of my thesis writing process. Coming into graduate school at Kent State University, I, like most master's students, did not have a solid research goal. My undergraduate degree at the University of New Hampshire shaped my attentions toward human and cultural geography, but did not provide me with a narrow focus on which to center my academics. My undergraduate studies did, however, allow me to take time to learn something that I enjoyed, American Sign Language. Growing up in Rochester, NY, home to one of the largest Deaf communities in the United States, I had the opportunity to take American Sign Language classes in high school. Wanting to expand upon this limited amount of study, I continued to take American Sign Language classes and be involved as a Teaching Assistant for these classes until I graduated, eventually receiving a minor in Deaf Studies. Luckily for me, American Sign Language was also used to meet my foreign language requirements for my geography degree. However the attitude towards American Sign Language began to change at the university during my junior year. Many departments on campus, including the geography department, stopped allowing American Sign Language to "count" as acceptable for a foreign language requirement. Though I had been grandfathered in to these new rules, I had a difficult time understanding why this was the case. When questioning faculty about the new rule, they simply stated that American Sign Language did not afford the same level of cultural education as other spoken language classes. Clearly, I disagree with this logic.

When I entered Kent State University, I was presented with the opportunity to read Lowenthal's *Geography, Experience, and Imagination: Towards a Geographical Epistemology*, the article containing the quotation above. While reading, I began to think about American Sign Language and the American Deaf community and the unique outlook that these people had on the world around them. Though I had never considered the possibility of combining my interests in geography and American Sign Language, after reading Lowenthal's article, it was all I could think about. Everything clicked. I realized that American Sign Language *is* geography. The language itself is geographic. I did not write this thesis to prove my undergraduate institution wrong. I did write it to promote other ways of thinking and open-mindedness and, of course, because I love American Sign Language. Being able to connect my two interests, American Sign Language and Geography, was something I did not expect when I began to pursue my master's degree, but it happened and I am thankful for it.

The second quote is also significantly placed after the first and not simply because it was written almost thirty years later. Soja's words express where I believe this thesis has taken me intellectually. In the process of writing this thesis, I began to critically think about language itself. Language has a profound impact on how we, as humans, interact with one another, with our environment, and with ourselves. Language is something we often take for granted, yet we can hardly claim to know anything if we cannot communicate what we know to other people. However, language *is* limiting. This thesis is about American Sign Language and nonetheless I have been forced to write it in written English. American Sign Language has no written form. On the other hand, there

are many aspects of American Sign Language that I would have loved to share but cannot be conveyed through written (or spoken) English. I am sure that limitations like these exist between different spoken languages as well, however I believe that without American Sign Language, people would truly miss out on the visual complexity of the world and the human mind. Communicating visually extends how we are able to look and see and really utilize one of our five senses: sight. Language is also successive. It builds upon itself. It is difficult to go somewhere new if we have not been to the place right in front of it. Hopefully explaining American Sign Language in English will allow us to attain new levels of thought and experience.

Soja's quote is not just a figurative end. It also marks the literal end of my thesis process as well. I read this quote in *Postmodern Geographies* the morning I started writing this preface, the last and final piece of writing to be added to my thesis before submission. It is ironic that I should do all this thinking about language and then upon finishing I find that someone much before my time has written such a perfect way to sum up my thoughts. Hopefully I can continue to build upon these ideas, in whichever language I choose.

There are several people who I wish to thank, the first being my committee who reminded me of why I chose to be a geographer and why it is important for me to stick with geography for the remainder of my career. Thank you to my advisor, Dave Kaplan, who has read and reread parts of this thesis more times than I can count and who has also been available for questions, help, and support whenever I need it, on whatever topic that may have arisen. Thank you also to Chris Post for serving enthusiastically on my

committee, I will try to make Lawrence proud. Thank you to Emariana Taylor for her willingness to join my committee at a month's notice and her desperate attempts to find a way to utilize GIS into my thesis. Perhaps someday I will work spatial analysis techniques into this project. I also have to thank my geography boys, the members of the geography reading group: John, Andy, Nick, and Don, for encouraging me to think more critically about space and always being there for support. Thank you to all the other graduate students at Kent State for letting me pick your brains while I wandered the halls of McGilvery and for being such a great community. Lastly, I could not end without thanking my husband, Kevin. Without his support I may not have tried to think about how to incorporate American Sign Language into a geography thesis at all.

Chapter 1



Figure 1: Statue at the entrance to Gallaudet University, the first university for the Deaf. Vision and the eyes are the most important features for understanding how the Deaf perceive the world.

Language shapes the way we are able to understand the world. Humans have developed ways in which to communicate with one another. Each language system grew out of cultural groups which were tied to specific geographical locations on Earth. As such, the diversity of languages throughout the world is immense. Living in diverse environments caused differences between languages to emerge across cultural groups. There is no need to develop words to describe things that are not present in one's life. For example, living in the Amazon rainforest, words would not be needed to describe

different types of snow, whereas such words would be needed in the Arctic. Because of these geographical limitations, language from the beginning limited how people could understand and interact with the world around them.

Though these differences in languages are important to keep in mind, most of the world's languages do have something in common. Most languages use an oral/vocal system to communicate. Because of the use of sound when having conversations, it has often been assumed that to use a language is to “speak” and to be addressed in a conversation is to “listen” or to “hear.” This mentality has affected the way that signed languages and the Deaf minority have been received by the world. Can one communicate if they cannot hear? What about if they cannot speak? How?

Within the last fifty years, however, linguistic research has begun to effectively address these questions. Signed languages are now understood to be full and natural languages. They have the same linguistic elements as spoken and oral languages. Signed languages also grew out of a particular environment. They were developed among a minority group of people who do not hear. Just as the geographical environment affects the ways in which people understand their surroundings, the absence of hearing has also changed how people live in their situation. Instead of using vocal sounds to communicate, this group of people uses visual movements created through space. The communication environment for people who use signed languages is within the space immediately surrounding the person's body, their personal space. The question now is not whether or not communication is possible if there is a lack of sound. Rather, the question that currently stands is how visual communication affects the way that people interact

with space and through space. Does visual and spatial communication have the same effect on the understanding of the world and lived experience as oral communication? In this thesis, I will address issues of space and communication. How does using American Sign Language create an understanding of space different from other forms of spoken languages? How does the American Deaf community view space? Why is it important that we strive to understand these different interpretations of space?

Addressing the interpretation of space in the American Deaf community makes a contribution to the geographical literature. Previous research on American Sign Language has been looked at by linguists such as Liddell, Bahan, Emmorey, Stokoe, Kegl, and Valli or within the discipline of Deaf Studies by people such as Bauman, Ladd, Lane, Padden, Bahan, and Van Cleve. Few studies on American Sign Language have been conducted by geographers. Notable exceptions have been the political minority studies conducted with the Deaf community in England by Valentine and Skelton as well as studies on education of Irish Deaf by Mathews. No geographer has looked at American Sign Language as a language or focused on the American Deaf community. This is a tremendous oversight on the part of geographers. American Sign Language, as a visual and spatial language, is inherently geographical. Geography, as essentially the study of spaces, can provide a unique take on the use of space to communicate in American Sign Language. It is the spatial aspect of the language that I will be most focused on in this thesis. Researching and understanding space from various angles is becoming an increasingly important facet of geographical research. As the discipline continues to grow and our world continues to change through technology and society, new social spaces

will open and be established. Understanding these spaces is an important part of the study of geography.

There is some brief terminology to consider before answering these questions. Whenever the word Deaf is spelled with a capital “D,” it is referring to the cultural group of Deaf people. Whenever a lower case “d” is used, the meaning of the term is the absence of hearing. The same principle holds true for the terms “Hearing” and “hearing.” The term Hearing in itself is only one example of how the use of American Sign Language has shaped how Deaf people understand the world. Most people who use a spoken language for communication would hardly include the label “Hearing” when identifying themselves to others, unless they were familiar with the Deaf cultural group. The line that is drawn between these two types of people is only drawn because of the types of language used by both groups. Often this line is only drawn by those people (Deaf people) who recognized that there are different ways that communication can occur.

In this thesis I will attempt to find answers to questions concerning use of space in American Sign Language. I will look to gain an understanding of how space is used linguistically and culturally by members of the American Deaf community. How is American Sign Language tied to the Deaf community? What is the role of space in American Sign Language communication? How do American Deaf overcome their surroundings to best communicate in a visual and spatial way? Does knowing American Sign Language enhance our understanding of space, the world, and the human experience? By a thorough reading of contemporary scholarship, in the next chapter I will

outline some of the ongoing debates in linguistic theory. I will explain how scholarship has linked the ideas of culture to language and how both of these entities lead to distinctive groups of people with unique views of the world. I will then connect these theories to geography and the concepts of landscape to elaborate on the different understandings of space and geographical surroundings held by diverse groups of people. Lastly, I will look at some of the basic theories and studies concerning American Sign Language to explain how American Sign Language research identified it as a language similar to other languages. This section will also include some aspects of the spatial nature of American Sign Language.

Chapter three will discuss, from the literature, the historical evolution of American Sign Language, as well as the aspects of American Deaf culture that make it unique. The history of American Sign Language is tied explicitly to the development and acceptance of American Deaf culture. Deaf in the United States have had to contend with adversity and denial that their language is a true and natural language. The development of culture surrounding the negative atmosphere regarding the use of American Sign Language has led to very specific attitudes among this group of people. Because of the bond between language and culture in American Deaf society, it is important to understand how both the language and the way it is used today came into being.

Chapters four and five will use my personal research to discuss the unique ways that members of the American Deaf community use space to communicate with one another. As someone who has been actively involved in American Sign Language classroom education for the past seven years, I am in a position to effectively use the

method of personal participant observation. Cultural geographers have traditionally used observation to get a sense of their surroundings by using their senses: sight, smell, sound, taste, and touch (Relph 1981, Groth 1997). Observation, however, can be broken down into areas of strict observation and participant observation (Lofland and Lofland 1995). Because I am observing people, it is much easier to use the method of participant observation as opposed to strict observation. The only way to truly strictly observe people would be behind a two-way mirror, something not plausible in my work with the American Deaf community.

There are essentially two types of participant observation. The first is research conducted with a known researcher. In this method, the community being studied is aware that a researcher is present and that they are being observed. The second type of participant observation is with an unknown researcher, the type that I use for my research. Having anonymity often allows the researcher to gain perspectives that they would not if the people being observed knew of their presence (Laurier 2003). It was important for me, as an observer, to be unknown. Watching how Deaf were conversing with one another, I wanted to be sure they were not changing the way in which they signed in ordinary conversation. Unknown participant observers must have some background knowledge of that which they are observing (Laurier 2003). Again my knowledge of American Sign Language and the American Deaf community were vital for me to be able to research Deaf use of space in communication.

Previous work in geography on the Deaf has also used qualitative methodologies. Valentine and Skelton (2008) conducted their research using surveys and interviews.

However, as neither was able to communicate in British Sign Language, they relied on an interpreter to convey the survey and interview questions to the Deaf participants. The responses were then interpreted into English from British Sign Language so that they could be used in the research report. In the case of Valentine and Skelton, the content of the responses as opposed to the way in which the responses were given was the most important aspect of their research. Because I am looking at the way in which American Deaf communicate, it is imperative that I can use American Sign Language. In her research, Mathews (2008) was able to conduct an ethnographic study for one year on the Gallaudet University Campus. Her knowledge of American Sign Language allowed her to conduct focus groups and participate with members of the American Deaf community. She effectively used participant observation while attending social events with her Deaf friends to observe how the Deaf “territorialized” Hearing spaces. While being the only Hearing member of the group often put her in awkward situations, having insider knowledge of American Sign Language allowed her to gain greater insight into the multiple identities of the Deaf community at Gallaudet University.

Based this personal participant observation at a variety of events in the Deaf community, I looked at how people arrange their own spaces as well as spaces around themselves for conversing with one another. Some of the places that I visited were fairly close to Kent, Ohio. These ranged from a picnic in Boardman, Ohio sponsored by the Youngstown Deaf Club to a Deaf game night at the Signs of Grace Church near Cleveland, Ohio. I also participated by taking American Sign Language classes at Kent State University and attending some of their sponsored events including the Fall Festival

in Aurora, Ohio, the ASL Academic Challenge and ASL Spotlight at Kent State University, and the sponsored lecture by Gallaudet University professor H-Dirksen Bauman also at Kent State University. Some events were further away such as the Ohio Deaf Fair in Columbus, Ohio and the Fifth Annual ASL Idol competition in Westerville, Ohio. Lastly, I also went to Gallaudet University to observe the campus of a space created for the Deaf as well as engage with some of the students and staff on campus.

At all of these places, I watched and conversed and observed how space was integral to the communication and language practices of the American Deaf community. The way that we describe our surroundings and our interactions with one another is a reflection, not only of our culture, but of our language as well. The language we use limits us to the terminology created within that language system. If our language uses sound, we are bounded to an extent by those sound patterns. If our language uses vision and movement, we are bounded to this as well. But what can we learn from those who communicate differently than us? What can American Sign Language and the American Deaf community tell us about our understanding of space?

Chapter 2

Language, Culture, and Space

“Deaf people are first, last, and of all time the people of the eye.”

- George Veditz
President, National Association of the Deaf, 1907-1910

The most obvious way that humans communicate with one another is through the use of language. Human language can take the shape of anything from carefully produced vocal sounds strung together to form what we term “words”, to artfully drawn characters on a page which represent abstract ideas, to visual hand and body movements displayed through space. Whatever form language takes, humans interact with it every day of their lives. Language is what allows people to relate to others, to learn, to express themselves, and, ultimately, to participate in the world. Language structure influences thoughts which then influence culture. With such a variety of language types, it is not surprising that there also exist a multitude of cultures attached to each language, each culture with its own unique view of the world. Culture and language are in constant interaction with one another, creating communication styles that are unique to community members.

Members of the American Deaf community share a common language, American Sign Language (Bauman 2008). Embedded in their unique language is an entire set of cultural norms, beliefs, and traditions (Ladd 2003, Padden and Humphries 2005). American Sign Language has a structure different from that of spoken languages. The visual nature of American Sign Language, as well as its use of personal space, creates a

unique grammatical structure for this language. Geographers and anthropologists look at the human landscape, or proxemics, to determine how people arrange themselves for communicating and living with one another. Different cultures will arrange themselves depending on certain cultural criteria that may be heavily influenced by the language that one uses. Therefore, the American Deaf population, with its use of American Sign Language will space themselves differently depending on how personal space is used for communication.

Culture, Language, and Thought

Many theorists from a variety of disciplines have examined the link between language and culture. They have asked questions regarding whether language and culture are separate entities, whether culture influences language, or whether language influences culture. In essence, a chicken and egg scenario is created in an attempt to determine which came first: language or culture? The current debate revolves around the way that one thinks and the language that one speaks as an outgrowth of the particular cultural group in which the person is involved. Do different languages create different patterns of thought which in turn affect the culture of a specific group of people? Or is language completely separate from thought, a universal concept that people inherently know? Though this issue is still heavily researched, it will help to assess the different approaches.

The beginnings of the debate over language and thought often date back to Plato's concept of forms explained in his allegory of the cave. The theories are then said to have

passed through the works of Locke, Diderot, Hammon, and Humbolt (Lucy 1997, Tohidian 2009). The most recent scholars that have had a large impact on the debate are the linguist Sapir and the chemical engineer Benjamin Whorf. By studying differences between English and American Indian languages in the 1920s, Sapir concluded that the “differences between language changed the way people perceive their environments” (Tohidian 2009). Similarly, twenty years later, Whorf, studying the Hopi language, posited that linguistic differences caused people to think in a specific way and determined the way the people *could* think. Whorf used differences in descriptions of time in Hopi versus English to illustrate the unique ways that speakers of both languages have in conceptualizing time. Both languages account for time (Hopi is not “timeless” as some have claimed), however the understanding of the concept of time differs because of the use of a particular language (Lucy 1997).

Taking the two scholars’ work together has become known as the Sapir-Whorf hypothesis which argues that language, thinking, and culture are all of the same mindset (Ting-Toomey 1999). An individual’s culture is based around the structure of the language being used. The Sapir-Whorf hypothesis concludes that the connection between language and culture leads to “separate conceptual realities for members of different cultures.” Individuals will think differently depending on the language that they use and the culture group that they belong to, establishing alternate ways of looking at the world (Ting-Toomey 1999). The oft cited example of the various words in the Eskimo language for “snow” is another example of how language, culture, and thought are inherently connected. Snow, being important to Inuit culture, has many words to describe it

depending on the type, location, and action of snow (Tohidian 2008). Another geographical example is the way in which people use directives in language. Cultures whose languages commonly refer to an objects location as “to the east” instead of “to the right” will “show more accurate dead reckoning skills when asked to indicate the direction of familiar locations from an unfamiliar site” (Lucy 1997). Clearly the everyday language that one uses affects a person’s culture, as well as the way that they engage with and think about their surroundings.

What is important to remember when referring to the Sapir-Whorf hypothesis is the academic setting from which it emerged. During the early part of the 20th century, linguists were concerning themselves with the grammatical structure of language as opposed to the concentration placed on morphology and meaning found in today’s linguistic debates (Goddard 2003). Indeed, Whorf was convinced that it was the differing grammars and structures of languages that allowed people to think in different ways:

“...the background linguistic system (in other words, the grammar) of each language is not merely a reproducing instrument for voicing ideas but rather is itself the shaper of ideas, the program and guide for the individual’s mental activity... Formulation of ideas is not an independent process, strictly rational in the old sense, but is part of a particular grammar, and differs slightly or greatly, between different languages.” (Goddard 2003)

Likewise, Tuan (1991) comments on language structure saying, “the grammar of a language can tell us something about what aspects of an object (or place) is emphasized” (parenthesis original). Therefore, by using the Sapir-Whorf hypothesis that language and thought, and therefore culture, are interconnected, language refers to the particular grammatical structure that is being used.

Philosopher and linguist, Noam Chomsky, also addresses the issue of grammar in his more recent works. He brings up the idea of the I-language to refer to the specific type of language that each individual speaks. Ultimately, the grammatical structures of languages allow for the same message to be conveyed in multiple ways. The personal choice of each individual for how to express their points is the basis for the I-language theory. Though each person who uses American Sign Language (or English) is communicating in one specific language that is equally understood by other users/speakers of that same language, the exact way that they choose to use the language may be different. Each individual then, has their own language (their I-language) that affects how they communicate and ultimately think and process information (McGilvray 2005, Smith 1999). Chomsky's I-language theory can be used to support the claims of the Sapir-Whorf hypothesis. Individuals use language differently, causing them to think differently, which is then manifested through cultural norms.

Today, the Sapir-Whorf hypothesis is still actively researched; however the name has been changed to the Linguistic Relativity Hypothesis to more accurately reflect the nature of the argument (Tohidian 2009, Continental Divide 2002). Several different schools have also arisen that reflect the views that either language *determines* thought or language *influences* thought, known as the Strong Theory and Weak Theory, respectively. In general, the weak theory is the most commonly used in order to avoid claims of linguistic determinism (Lucy 1997). Language is seen as a representation of those entities that it is trying to express. As such, language could be compared to a map. Just as maps represent certain areas on Earth and in turn create a particular way to look at

those areas, “language embodies *an interpretation* of reality and language can *influence* thought about that reality” (Lucy 1997). Expressed another way, “we can study other languages and linguistically expressed viewpoints...to expand our ‘perceptions’ and ‘conceptions’ of the world” (Kodish 2003). Knowing multiple languages often gives us a new understanding of the world because of the uniqueness of each languages’ structure and its connection to thought.

There are several opponents to the views of the Linguistic Relativity Hypothesis. Many of the Linguistic Relativity Hypothesis’ critics cite the works of Noam Chomsky which claims that “language is an instinct,” to back up their theories (Kodish 2003). Chomsky’s dominance in linguistic thought in the United States has often put a damper on researchers of the Linguistic Relativity Hypothesis because of his consistent argument that language is universal. Scholars have taken Chomsky’s ideas to mean that because language is innate, it must therefore be independent of thought. Spin-offs of Chomsky’s ideas have gone so far as to say that language is genetic and “not a cultural artifact” (Kodish 2003).

However, Chomsky’s ideas add to (as opposed to detract from) the claims of the Linguistic Relativity Hypothesis. Chomsky argues that language is what makes humans distinctly different from other forms of life (animals, insects). Humans have a large variety of languages; however humans are capable of learning and understanding other human languages. Therefore, when Chomsky says that language is innate, he is referring to the fact that all human language shares specific qualities that allow for shared understanding. For example, every human language is made up of the same basic

structures. There are nouns and verbs in each type of human language. Human understanding of these structures (grammar) is what is innate. As Smith states, Chomsky proposes that “we do not need to *learn* that our language contains nouns and verbs: all languages contain nouns and verbs. What we need to learn is which noises our language associates with particular examples of them” (Smith 2005). In other words, we do not need to know which words/signs are nouns or verbs to be able to use them as such. According to Chomsky, grammar is built into humans so that they may have a natural capacity to learn language in order to communicate with one another. However, as explained above, the I-language that people use, in conjunction with the specific language they use, creates different forms of language for every individual. These unique language forms must have an impact on the way humans are thinking and phrasing their communication patterns. Therefore, language, and the choices people make that establish their I-language, are dependent on thought. Thought helps to determine the way people structure communication and the way they culturally express themselves.

Similar to the ideas of the Linguistic Relativity Hypothesis is the work of the linguistic philosopher, F. Waismann. His work takes the notion that language influences thought and uses it to express how language shapes a person’s worldview. Native speakers of a particular language, because they grow up with a specific semantic and syntactical structure, establish a uniform outlook on the world. Language “shapes and fashions the frame in which experience is set, and different languages achieve this in different ways.” It is the language of an individual that will lead them to act and see their surroundings in a certain way (Waismann 1965, Lowenthal 1961).

The concepts of language and culture have been applied to the geographic tradition most frequently through the study of place by geographers such as Tuan, Relph, Lowenthal, and Cosgrove. For different groups of people, “words have great power in creating place...gestures, either alone or in association with speech and the making of things, create place” (Tuan 1980). Language serves as a way of not only demarcating significant places, but also determining *how* a place is perceived. However, as geographers, the concept of space can be looked at in addition to the idea of place. Space is most frequently conceptualized as a container, an entity which holds things such as actions, events, and people within a specific area. Spaces are inherently different than places. Places incorporate all the senses, emotions, and actions of people’s everyday lives. It is a place that will often cause people to take a moment to reflect on the situation around them, leading Tuan (1977) to characterize spaces as movement and places as pause. This is not to say that places are more important than spaces. As Nigel Thrift (2003) points out, it is only recently that the complex nature of spaces is taking a more predominant role in geography. While place is something that could be looked at more closely in this thesis with regards to how Deaf create places and what those places mean to them, the idea of space will take a predominant role instead. American Sign Language is performed through space, which in turn helps to create place. These spaces of language production, and how in turn these spaces influence other aspects of Deaf culture, language, and thought, are the focal point of my research.

American Sign Language

It is clear from the above discussion that the structure and grammar of a language will lead to a particular way of thinking. This way of thinking becomes ingrained in culture and leads people of that particular culture group to see the world in a specific way. Like maps, language represents physical and abstract entities on Earth. American Sign Language is a language that is expressed very differently from spoken languages. Instead of a spoken language that will use vocal sounds to produce words that take on meaning and representation of objects and ideas, a signed language does not make use of auditory signals, but uses hand shapes, body positioning, and movement to express thoughts and concepts (Crystal 1987, Stokoe 1960). Movement through space gives signers a different understanding of the meaning of personal space. Because of the very nature of American Sign Language as visual and spatial, this communication method must have implications of space that spoken languages do not.

Studies of the structure and syntax of American Sign Language have become more predominant since William Stokoe's decisive work on the language. Effectively proving that American Sign Language was in fact a full and natural language and not a series of gestures representing English words, Stokoe's work paved the way for more research, not just on American Sign Language, but also on the American Deaf community as a cultural and linguistic minority group (Stokoe 1960, Neidle 2000, McNaughton 2004, Graybill 1993).

Prior to Stokoe, American Sign Language was linked to body language and gesturing. Kendon and McNeill proposed a theory known as the Gesture/Speech Continuum to explain the relation of gesturing and signed languages:

Gesticulation → Language-like Gestures → Emblems → Signed Languages

The gesture/speech continuum begins at gesticulation, the types of hand gestures that people use while simultaneously speaking, and moves from language-like gestures, gestures that may take the place of a word; to emblems, gestures that are culturally specific and have specific meaning; and eventually to signed languages. The whole idea of the gesture/speech continuum is to relate the types of gestures hearing people use while speaking to speech itself. However, it also has implications for the meaning of signed languages. If signed languages are in fact related to gesticulation, does this mean that signed languages are as inherent as gestures and therefore related to speech-language as opposed to being its own form of language unrelated to speech?

There are certainly similarities between signing and gesturing (Crystal 1987, Burgoon et. al. c1996). In spoken languages, hearing people will make small body movements or gesture when doing specific things, a head tilt when asking a question or a gaze of the eyes towards a specific reference point. These small bodily movements are emphasized greater in American Sign Language. The entire grammatical structure of signed languages is made up of facial expressions (Neidle 2000, Valli et. al. 2005). The eyebrows are raised for asking yes or no questions while they are lowered for asking questions beginning with who, what, when, where, why, and how. Head tilts and eye gaze

as well as how wide or narrow a signer's eyes and mouth are open indicate distances. Slight head tilts are used to mark distinct pauses in a phrase, where written languages would use a grammatical marker such as a comma (Neidle 2000).

Recent studies on nonverbal communication, gesturing, and American Sign Language show that there are distinct differences between gesturing and signing, what has come to be known as the “cataclysmic break” between gesture and language. Gesticulation is starting to be seen as a process within and part of spoken communication. Communication scholars hold that “any definition of communication...must include nonverbal behavior in its broadest sense” (Bratanic 2007). Because gesturing is part of spoken languages, the gesture/speech continuum may no longer hold true. A study conducted by Singleton, et al. (1995) shows that this is indeed the case. By looking at the way hearing people with no knowledge of any signed language gesture while speaking and then gesture differently when they are not allowed to speak, the authors concluded that there is a significant difference between gesticulation and gesturing without speaking. The gestures that participants conducted without the use of their voice took on a different form that used some functions closer to that of signed languages than to gestures. This study effectively proves that there is a cataclysmic break between gesticulation and gesturing without words. This in turn tells us that there is a distinct difference between gestures and sign language. Gestures are a part of spoken language where as signed languages are languages of their own and may not be related to gesturing at all. However, the authors do not want to push the meaning of this break too far. They stress the fact that there is still a strong difference between gestures without speech and

signed languages (Singleton et. al. 1995). The main factor involved in the differences between gestures without speech and signed languages are time and people. It takes time to develop a uniform set of signs (or words) universally understood by all users/speakers of one language. It also takes interaction between people for the purpose of understanding one another. Lastly, it takes first generation native speakers of a specific language to continue to change and adapt the language (Bauman 2008, Bahan 2008).

The lack of a written form of American Sign Language also marks it as distinct from other types of languages and sets the culture apart from those groups who speak and write. The use of personal space within American Sign Language structure is one of the difficulties in creating a written form. Because American Sign Language shows thoughts and concepts in space, it is very difficult to put down on paper (Liddell 1995). Therefore, speakers of American Sign Language have a culture similar to members of other oral language groups.

Oral language group studies typically focus on native or aboriginal tribes who have not adopted forms of writing. These groups are seen to be in tune with nature and have a strong bond to place and surroundings. Scholars who emphasize the idea that orality leads to being in tune with natural phenomena often think of cultures who have a more direct relation with the land, a subsistence or primary economic group. However, the American Deaf also show characteristics that prove they pay specific attention to what is around them. Bauman stressed the idea that users of American Sign Language “create films daily” when describing a situation because of the amount of detail and attention that is paid to “setting the scene” (Bauman 2009). The visual nature of Deaf

culture also allows Deaf to be more perceptive to people and spaces close to them, often knowing small things like the number of doors in a hallway without having to count them (Bahan 2008). Oral cultures also must compensate for the lack of a written record. Histories are preserved in many ways: through the creation of songs passed from one generation to the next, in the use of storytelling by specially trained people who held a certain reverence within the community, by the establishment of festivals to create gatherings where storytellers could perform (Adams 2009).

Until very recently, having no written form made it difficult to keep a record of the evolution of American Sign Language and for Deaf to communicate with one another without being in close proximity. Deaf would tend to congregate in areas around Deaf schools and create their own communities and social places, like Deaf clubs. Evidence of this can still be seen today in such areas as Washington, D.C. and Rochester, New York, although the number of clubs has declined substantially (Graybill 1993, Valli et. al. 2005, Bienvenu and Colonomos 1986, Bienvenu and Colonomos 1987, Padden 2008, Valentine and Skelton 2008). Story telling in American Sign Language is an important cultural activity that is still widely practiced. Regional conferences are often held for storytelling events where famous storytellers can recount episodes in their lives or well known Deaf-lore or jokes (Bahan 2008, Bauman et. al. 2006, Rutherford 1983). Today with the advancement of video technologies including the internet, webcams, and video blogs (vlogs), it is much easier for Deaf to stay in touch over long distances as well as have an extensive visual literature. Despite this, many of the cultural elements set in place by the fact that American Sign Language has no written form still thrive. The increasing

availability and lowering cost of video technologies, however, may have a significant impact on the oral nature of Deaf culture and American Sign Language.

Proxemics and Human Landscape

The unique structure of American Sign Language utilizes personal space for communication. Because space is being used for conversing in American Sign Language, signers must position themselves to allow for the use of personal space for signing. Again, because language is related to thought and therefore culture, users of American Sign Language will have a different view of space than non-users. They will also position themselves within the human landscape differently. Tied into this argument and the geographic tradition is the notion of scale. While an in depth discussion of scale is not feasible here, it is important to recognize the scale at which I am operating. Geographic scale consists of a broad spectrum of ways to look at the Earth. The larger scales, macro-scales, look at larger spaces such as a region or city. Macro-scale examples of the Deaf are found in their communities, such as the city of Rochester, NY, where many of them choose to live. American Sign Language also exists on some level in macro-scale if we look at regional dialects of the language (discussed more in chapter 3). Narrowing the scope of the macro-scale a bit, Deaf buildings (a product of the new Deaf architecture movement discussed in chapter 5) and living spaces come into focus.

The macro-scale examples of Deaf communities and architecture are products of the spaces used in the production of American Sign Language. The spaces for communication exist at the level of the micro-scale. This scale is centered on the body

and the personal space that the body inhabits. Edward Soja remarked in 1989 that what was becoming increasingly clear in geography was the importance of “a remarkable micro-geography of human interaction hinging around the portable bubbles of personal space zonation and ‘proxemic’ behavior.” This is the level at which spaces of American Sign Language communication exist.

In order to address the use of personal space and spatial arrangement of signers it is important to understand what exactly proxemics is. Proxemics is the study of personal interaction in space, how one arranges oneself and their surroundings in order to interact with others around them (Hall 1982, Lawson 2001). The study of proxemics is fairly new (McMurtry 2000). Coming out of anthropology, the study of proxemics first looked at the idea that each individual is “surrounded by a personal space – in the form of a ‘protective bubble or sphere’ – which is an integral part of us, and which follows us like a ‘portable territory’” (Hogh-Olesen 2008). This concept made sense from an evolutionary perspective as humans are likely to want some form of protection in case of danger or attack. However, as proxemic theory grew, it was recognized that there are several factors that influence a person’s use of personal space including gender, age, personality, relation, and culture. Referring back to oral cultures, Adams (2009) explains how proxemics has an impact on these peoples. Calling oral cultures “verbomotor cultures” he explains that proxemics limited each culture because the people were dependent on sound and how far the voice could carry. What is striking about comparing the American Deaf community to “verbomotor cultures” is that, while proxemics does affect the community,

the American Deaf are affected not by sound, but by sight. Communication can only go as far as the eye can see.

American Sign Language requires a fairly significant amount of personal space, more so than verbal communication. Also, communication is dependent on being able to *see* the person who is signing. Because of these two things, people who are signing will arrange themselves accordingly. They will want to be in the best position to utilize as much space as they need, but also to be able to see the whole space that any other signer who they are communicating with will also need. Signers will tend to stand in circles when communicating in a group (Valli et. al. 2005, Bienvenu and Colonomos 1988a, Bienvenu and Colonomos 1985). The spatial arrangement of surroundings near a signer ranges from the simple shape of desks in a classroom moved into a semi-circular shape so that all students can see the instructor to the most desirable way that a house for a Deaf person would be designed (Bahan 2008). These everyday occurrences, from having to hide your hands behind other objects in order to “whisper” to being able to have a full conversation from opposite ends of an auditorium, are so banal most would not even notice. However, it is precisely events such as these that make Deaf who they are culturally.

Proxemics is not just concerned with the arrangement of people on the landscape. Proxemics also looks at personal space and its use by different types of people. There have been several studies that show that the use of personal space varies by culture. These studies have shown that the biggest difference lies between what are known as Contact cultures and Non-Contact cultures. Many of the Contact cultures can be found

closer to the Equator in countries such as Italy and India while Non-Contact cultures are found in northern latitudes such as Finland and Denmark. The main differences between the two cultures are the amount of personal space that they use and that they will “give up” to others. In other words, Contact cultures will allow people more often to breach their personal space than Non-Contact cultures (Hogh-Olesen 2008). In the case of the American Deaf, contact is often essential for getting a person’s attention when their back is turned, meaning that contact is not seen as a threat, but as a welcoming gesture.

Lastly, because American Sign Language uses personal space for communication, the different types and uses of a signer’s personal space will fall under the study of proxemics. Calling into question the notion that there is a specific syntactic and topological space found in American Sign Language, Liddell has recognized three different types of spaces used when signing: real space, surrogate space, and token space (Liddell 1995). He also discusses in detail one of the main functions of surrogate space, to represent a person or object, and the way that this particular space changes depending on context (Liddell 1990). A counter to Liddell’s views of space, Padden also coins two classifications of types of personal space used while signing, referring to these spaces as neutral space and specific space (Padden 1990). Proxemics encompasses a wide variety of different ideas of spatial use. Because space plays such an important role in American Sign Language structure, proxemics must be taken into consideration to determine whether or not space takes on meaning in Deaf culture unlike that in Hearing culture.

Conclusions

It has long been thought that language and thought are interconnected. Though the debate still rages, it is hard to deny that at the very least the structure of language influences how people think. Because of this influence on thought and because there are numerous languages linked to different cultures, each culture must have a unique way of thinking depending on the structure of their language. The humanist geographer Lowenthal sought to incorporate this concept into the idea of a personal geography that was dependent, not only on culture, but also on language use.

The American Deaf community is a distinct cultural group within the United States that uses American Sign Language as its primary form of communication. American Sign Language, as a visual and spatial language, has a unique structure that separates itself from other spoken and written languages. Personal space is used to convey meaning. Because of how personal space is incorporated into the syntax and structure of American Sign Language, space is conceptualized differently for native users of American Sign Language than it is for speakers of spoken languages. For users of American Sign Language, space takes on a different representational meaning than it does for people who use spoken languages. Looking at the proxemics of how Deaf situate themselves in space is one way to notice the different meanings and conceptualizations of space in Deaf culture. Another way is to look at exactly how personal space is used in American Sign Language structure. Once it is recognized that language structure lends itself to different ways of thinking about the world, understanding cultures different from our own becomes an easier task.

Chapter 3

American Sign Language and the Creation of American Deaf Culture

“As long as we have Deaf people on earth, we will have signs”

- George Veditz
President, National Association of the Deaf, 1907-1910

American Sign Language is explicitly tied to members of the American Deaf community. Though Deaf in other countries have begun to pick up American Sign Language as their preferred method of communication, the development of the language is a product of the forces that helped shape the American Deaf community. Like other languages, it is often impossible to separate American Sign Language as a language from the historical and political movements that occurred in not only the American Deaf community, but also in the world Deaf population. Because the American Deaf community and American Sign Language are so closely tied, it is difficult to give a brief overview of the growth of American Sign Language without addressing events that have been played out in the United States and on the global stage. Keeping historical detail to a minimum, I will trace the evolution of American Sign Language to explain its existence today. Events occurring outside the Deaf community initially helped to create a community centered on a language. Later, the course of events shifted against the community, causing the bonds within the group to strengthen. Today, as a result of these strong ties to culture and language, the American Deaf community stands as a group with its own history and agenda. As not only a specific branch of the language tree tied to a

central culture group, American Sign Language is a pillar of culture within the American Deaf community that would not exist as it does without the community itself.

Origins of American Sign Language

American Sign Language grew out of older traditions of sign languages. There are countless numbers of sign languages around the globe. Indeed one of the most common misconceptions that people have when they encounter a Deaf person is that the Deaf person is able to communicate with all other Deaf people. While the structure of sign languages is similar enough that a pidgin sign language can usually be formed between two different Deaf cultural groups, there is no universal sign language (Bauman 2008). Many “western” Deaf cultures cite Plato, the famous Greek philosopher, when discussing the origins of their language. In several of Plato’s books, he discusses groups of people who, unable to hear, have created a language which they display on their hands (Lane et. al. 1996). Whether or not sign languages all share a common ancestry is unknown, however sign languages, being unconnected for the most part to their spoken counterpart, each have their own history of development. The evolution of American Sign Language is fairly unique in this sense because it has a known origin and distinctive factors that influenced its changes. Similar to spoken languages, sign languages constantly evolve, adding more dimensions to their history. Changes in American Sign Language are very much products of events that had a direct effect on the American Deaf Community.

The first roots of a formalized sign language in the United States date back to the early seventeenth century. The island community of Martha’s Vineyard off the coast of

Massachusetts has had through its history (after European settlement) an unusually high percentage of Deaf people. During the peak in Deaf population on Martha's Vineyard in 1854, one in 155 people on the island were deaf whereas in the rest of the continental United States only one in 5,728 were deaf (Van Cleve and Crouch 1989). Because of the high instance of deafness, the community on the island was virtually fluent in the island's version of sign language, Martha's Vineyard Sign Language. Speculated to have been brought from the Kent region of England, Martha's Vineyard Sign Language played an extremely important role in the creation of American Sign Language. Unfortunately, Martha's Vineyard Sign Language has fallen victim to the same plague as many other sign languages around the world – it became extinct with the death of the last Deaf person on the island in 1954 (Van Cleve and Crouch 1989).

Martha's Vineyard Sign Language was never able to extend its reach beyond the small island community. Therefore, by the early eighteenth hundreds, Deaf people in the United States still did not have a formalized method of communication. Often a series of "home signs" were developed for communicating with family members and close friends. These "home signs," however, were basically symbols as opposed to a fully developed language. The search for a formalized "American" sign language is a well-known event among members of the American Deaf community and a favorite of Deaf storytellers. The story begins with the Reverend Thomas Hopkins Gallaudet, who lived next door to the Cogswell family in Hartford, Connecticut. The Cogswell's had a daughter, Alice, who was deaf. One day during the year 1813, while Gallaudet was visiting the family he began some attempts to communicate with Alice. After teaching her how to spell the

word “hat” in the dirt outside her home, he realized that though she could not hear, she was still intelligent and capable of learning.¹ Gallaudet returned to see Alice on a regular basis and eventually taught her how to read and write. While teaching Alice, Gallaudet tried to think of a way that a school for deaf children could be established. He read several articles about how deaf children in Britain were being educated using a sign language system and the success that the system had in educating children and adults. After receiving financial backing from Alice’s father, Gallaudet planned a trip to England to learn these educational methods in the hopes of starting a school for the deaf (Van Cleve and Crouch 1989).

Upon arriving in Britain, however, Gallaudet was disappointed by the lack of attention that he received from teachers at the local deaf schools. The unwelcoming reception would probably have turned him back to the Americas if it were not for a demonstration of Deaf students’ abilities that he attended in London. The demonstration was by a group of deaf students from a deaf school in France. France had a different method of teaching deaf students than the English did and was displaying its successes in London. After the demonstration, Gallaudet approached the students and decided to return to France with them to learn more about French Sign Language. In France, Gallaudet became close with the star pupil in the school’s London demonstration, Laurent Clerc. Eventually, Clerc agreed to go back to the United States with Gallaudet to help establish a deaf school. The next part of the story often highlights the mutual goal of

¹ This was a significant realization in the early 1800’s as the term most often used to describe a person who could not hear was “deaf and dumb.” The use of this term spread the belief that because the person could not hear or speak, they also could not think.

the pair in creating a school for the deaf, how Clerc taught Gallaudet French Sign Language and in return Gallaudet taught Clerc English on the voyage to the United States (Van Cleve and Crouch 1989, Alexander and Gannon 1984).

Growth of Residential Schools and the “Golden Age of Deafness”

Gallaudet and Laurent Clerc are recognized as the founders of American Deaf culture because of the importance placed on their actions when they returned to the United States. The establishment of residential schools served to unite the Deaf for the first time and subsequently caused a culture to grow around American Sign Language. The spread of Deaf culture without resistance from outsiders allowed it to flourish. As a result the middle and late 1800s can be seen as a “Golden Age of Deafness.” Deaf culture and American Sign Language grew and spread together across the United States.

The first school Clerc and Gallaudet set up was the Connecticut Asylum for the Education and Instruction of Deaf and Dumb Persons (today called the American School for the Deaf), which opened in Hartford, Connecticut in 1817 (Van Cleve and Crouch 1989). This school served not only as the model for which other schools for the deaf were later based, but also as the place of education for those Deaf who went on to establish schools in different states. Because there were no other institutions in the United States designed specifically for the deaf, the American School was set up as a residential school. Children from across the United States who were sent to the American School lived in residence halls with other deaf children. In the residence halls, American Sign Language grew. Many of the deaf people who came to the American School brought with them

their “home signs” and mixed them with the French Sign Language taught in classes. The close proximity of the American school to Martha’s Vineyard also allowed many deaf from the island to attend the school, adding Martha’s Vineyard Sign Language into the mix.

Through residential living, not only was a formalized version of American Sign Language created, but also the basics of Deaf culture. Attending a residential school was often the first time that a deaf person had contact with others like themselves. With so many deaf people in close proximity to each other, cultural norms began to be established. Deaf people started to follow specific “rules” for living with one another. Cultural norms ranged from appropriate ways to get one another’s attention to the adoption of values, such as the importance of windows and light (Bahan 2008). As students graduated from the American School, they went back to their home states where many established schools for the Deaf, aiding the further spread of American Sign Language and attached to it, the new American Deaf culture. From the initial spread of American Sign Language throughout the United States, Deaf culture, as established at the American School for the Deaf, was joined with the language. Teaching the correct use of American Sign Language also taught Deaf students parts of Deaf culture, such as where to stand when signing to a group or how to communicate with a person across a room. Deaf people finally had their own method of communication, one that was increasingly intertwined with specific cultural norms and values.

Though those Deaf who established deaf schools were taught for the most part at the American School for the Deaf, regional differences in American Sign Language do

exist. As spoken languages change or have regional variability in word usage, so does American Sign Language (Bienvenu and Colonomos 1987). Fueled by the fact that there was often only one school for the deaf in each state, new developments in the language clearly were regionally based. Similar to accents found in spoken languages, regional signs were created for words from *birthday* to *window blinds*. Variability can also be found between generations, with older generations of Deaf often using more formalized signs and younger generations establishing “lazier” signs. Additionally, in the southern United States, because of segregation in schools, the African American Deaf community created their own cultural signs. Some of the newest changes in American Sign Language have come from the influence of spoken English and the Oralist movement, explained later, and the subsequent backlash from these events.

With the further establishment and spread of residential schools for the deaf, came an era of political and cultural freedom during which time American Sign Language and Deaf culture flourished. This pseudo “Golden Age of Deafness” is a period in Deaf history that many Deaf today look back on nostalgically and strive to return. During this era, Deaf owned and operated residential schools across the United States. The residential school that a Deaf person attended became a home for many Deaf people. It was here that they made their friends and also often met their spouses. Residential schools became ingrained in Deaf culture and the desire to stay connected to them was, and still is, very strong (Padden 1996, Emerton 1996). The residential schools began to publish their own newspapers, referred to as the Little Papers, as the best way for members of the Deaf community to keep in touch with one another after graduation. Deaf also began to start

their own communities based on types of employment. Printing companies, residential schools, and manufacturing became primary forms of employment for Deaf people. Moving to the same cities ensured that the Deaf would remain connected to one another. However, it also established specific geographical areas for American Sign Language to be used and Deaf culture to stay intact.

By creating pockets of Deafness, the American Deaf community was able to push for specific services and needs for Deaf people. One of the earliest and most prominent organizations, still in existence today, is the National Association of the Deaf (NAD), formed in 1880 in Cincinnati, Ohio (Senghas and Monaghan 2002). This group, along with other political Deaf groups, ensured that Deaf needs were understood throughout the United States, even addressing the idea of the creation of a Deaf State in the newly opened Western United States (Van Cleve and Crouch 1989). Deaf clubs provided a more social role. As the nineteenth century came to a close, United States' society began to shift from a predominantly agricultural society to a manufacturing economy, bringing more people to urban environments. Deaf clubs were formed in urban centers to give members of the Deaf community a place to socialize with other Deaf or coordinate other social activities such as sports teams and game nights.

With the success of the residential schools during the Deaf "Golden Age," many Deaf started to lobby the government for the creation of a Deaf college. In 1864, the Collegiate Department of the Columbia Institution of the Deaf and Dumb was provided a charter by Abraham Lincoln, effectively establishing an all deaf college in Washington, D.C (Van Cleve and Crouch 1989). The name was later changed to Gallaudet College in

honor of Thomas Hopkins Gallaudet. Today, Gallaudet College has transformed into a full liberal arts university, Gallaudet University, and is the only liberal arts university specifically for the Deaf in the world. Since its inception, Gallaudet University has taken on a predominant role in the American and global Deaf communities likened to a sacred place or homeland by many (Bauman 2008).

The first series of events in American Sign Language evolution were set in motion by people outside the American Deaf community, Thomas Hopkins Gallaudet and Laurent Clerc. The impact, however, was to establish a formalized language for the Deaf. The unexpected results were that a culture, distinct from other American groups, formed and flourished. Unfortunately, the Golden Age of Deafness would not last.

Oralism and Resistance

The middle and late nineteenth century was certainly a positive era of growth for American Sign Language and American Deaf culture. By the end of the 1880s events, again from outside of the American Deaf community, began to unfold that would negatively alter the course of American Deaf cultural development for almost a century. The unforeseen effect of these events was to strengthen the American Deaf Community instead of abolishing it. American Deaf pulled together in order to preserve what they held important, American Sign Language and the set of cultural values their associated culture brought with it. From the late nineteenth century until the 1970s the Deaf were caught up in a struggle to maintain their identity.

Technological innovations in industry, transportation, and communication during the 1880s were coupled with advancements in other sciences and medicines. These medical advancements often met with new waves of thought from the Social Darwin and eugenics movements. Suddenly, Deaf no longer felt accepted by society. Instead, they were now seen to have something inherently wrong with them that needed to be “fixed.” Led by Alexander Graham Bell, a new national and world wide movement sought to eliminate instances of deafness. Residential schools that promoted Deaf identity and American Sign Language were the first places that Bell attacked. Believing that Deafness was genetic and because many Deaf often met their future spouses during their school years, Bell saw Deaf schools as a breeding ground for the continued existence of deafness (Van Cleve and Crouch 1989).

Other educators of the Deaf in Europe also began to raise issue with the perpetuation of sign languages. Hearing educators saw the use of sign language as being detrimental to the development of a Deaf person and a barrier to full participation in society. The question of deaf education eventually reached a level of world concern and a meeting was organized in Milan, Italy in 1880 to discuss the future education of deaf people. Known as the Congress of Milan, this meeting had a profound impact on American Sign Language, Deaf culture, and Deaf education for close to one hundred years. Of the 164 people that attended this conference from Europe and the United States, only *one* attendee was himself Deaf. Being considerably outnumbered, the congress voted 158 to 6 to ban the use of sign languages and fingerspelling in deaf education. Instead instructors of the deaf were to rely on lip reading and speaking only (Burch

2002). The Deaf had lost their ability to manage their own affairs. Again events taking place outside of the Deaf community had a pronounced effect on the use of American Sign Language, though these actions, instead of helping the Deaf, did more harm than good.

The decisions made by the Congress of Milan spurred an event known as the Oralism movement, a period of repression and struggle for members of the American Deaf community. Though most Deaf still attended the residential schools set up in the early 1800's, education was now conducted primarily through speech and lip reading. Any student caught using signs in the classroom often had their hands beaten with a ruler or were forced to sit on their hands for the remainder of the class period. The movement was so "successful" that by the year 1920, over eighty percent of all Deaf in the United States were educated without the use of American Sign Language or fingerspelling (Van Cleve and Crouch 1989). Because of the emphasis on oralism, Deaf people were no longer permitted to be teachers or administrators at these schools. Many continued to work at the residential schools, however, in other jobs such as groundskeepers and dorm parents. These roles became essential parts of Deaf culture. American Sign Language went underground. Being in close quarters during after school hours allowed for Deaf children to learn how to converse in American Sign Language from older students or dorm parents. Children who were born to Deaf parents (known as Deaf of Deaf) took on a special role, as did the deaf residential schools themselves, in the promotion and continuation of American Sign Language (Padden 1996, Burch 2002).

The Deaf clubs established prior to the Oralism movement also played a new role: the continued existence of a language. Many Deaf strove to establish their own clubs in their places of residence and take ownership of a building in which to have the club (Bauman 2008, Padden 2008). Clubs and residential schools were truly havens of American Sign Language during this period. In fact, the eradication of American Sign Language was of such high concern that the National Association of the Deaf (NAD) and its president George A. Veditz put together a series of films that documented the language in the early 1900s. These films are still held by the NAD today and regarded as one of the most important forms of historical Deaf literature (Burch 2002).

This period of repression and resistance has had a stunning effect on American Sign Language as it exists today. Since more Deaf people were learning American Sign Language in conjunction with English, words and phrases from English started to appear in everyday use in American Sign Language. “Loan signs,” signs that borrow English words in order to sign them, became incorporated into American Sign Language. The mouthing of certain English words, instead of sticking to specific American Sign Language facial grammar, also changed the way that the language was used. Oralism also had a significant impact on Deaf culture. Because the Oralism movement continued through the 1970s, there are still a substantial number in the Deaf community who were prevented from signing while attending school. Deaf people from the oral generation are often wary and untrusting of Hearing people due to the perceived assault on Deaf culture and the Deaf method of communication, American Sign Language. Though this is beginning to change, there is still a sense in the Deaf community that Hearing members

of society cannot be trusted (Bienvenu and Colonomos 1988b, 1988a). The assumed lack of acceptance in Hearing society of Deaf people has recently led to the coining of the term *audism*, meaning a person who discriminates against another based on whether or not that person can hear (Bauman 2008). The struggles that American Deaf went through during this time are still reflected in Deaf culture and American Sign Language. The resistance to Oralism changed Deaf culture, but also served to make a more cohesive group identity based around a unified cause.

Sign Language Accepted?

A turning point in the acceptance of American Sign Language finally came in 1960 when a Hearing linguist, William H. Stokoe, published his groundbreaking study on the linguistics of American Sign Language. Events outside of the Deaf community were again having an effect on the acceptance of American Sign Language, though this time in a positive way. Deaf were finally given the means to push back against those who sought to repress American Sign Language. Resistance finally peaked at Gallaudet University 108 years after the Congress of Milan.

William H. Stokoe was working as an English professor at Gallaudet University in 1960. Though Deaf education was still in the throes of the Oralism movement, Gallaudet University survived as a place where American Sign Language was used freely by students on campus. Stokoe was in the perfect position to observe and learn American Sign Language. Stokoe, using his knowledge of linguistics, effectively “proved” that American Sign Language was a true natural language (Stokoe 1960). With Stokoe’s

research to back them up, Deaf people began to advocate for the use of American Sign Language in education and as the best and most effective way of communication for a Deaf person. Stokoe's study started a spiraling movement of Deaf rights activism. Because American Sign Language was beginning to be accepted as a natural language, like English or Spanish, it became more acceptable to use as a method of instruction in Deaf schools. Instead of being forced to lip read, where the average person can only understand around thirty percent of language because of the similar mouth shapes produced by different sounds, deaf children were taught using the method of communication best suited to their situation: American Sign Language.

With the push for the use of American Sign Language in the classroom came a desire to access other rights available to Deaf people before the Oralism movement. The growing Deaf rights movement reached a boiling point during the 1988 Deaf President Now protest at Gallaudet University. Though Gallaudet University had remained a haven for American Sign Language throughout the years of staunch Oralism, professors were not required to know American Sign Language and the university had never had a Deaf president. In 1988, the university board of trustees was assigned the task of picking a new university president. The search had been narrowed down to three candidates: I. King Jordan, a Deaf man and current dean of the College of Arts and Sciences at Gallaudet University; Harvey Corson, another Deaf man and superintendent of the Louisiana School for the Deaf; and Elizabeth Ann Zinser, a Hearing woman with no prior experience working within the Deaf community. When the board of trustees chose Zinser over the other two candidates, Gallaudet University's student body erupted. Organized by

three Deaf of Deaf students, the Deaf President Now protest effectively shut down Gallaudet University for an entire week. Rallying support from the rest of the Deaf community throughout the United States, a march to the capital was organized with protestors displaying signs that read “We Still Have a Dream.” The message was clear. The Deaf community was tired of a century’s worth of repression and was ready to act. Hoping to regain control over their own affairs, the protestors demanded that Zinser step down as president, one of the Deaf candidates be put in her place, and that fifty-one percent of the board of trustees be composed of Deaf people (Graybill 1993).

Eight days later the protestors’ demands were met and I. King Jordan became the first Deaf president of Gallaudet University, proving that Deaf were completely capable. Due to the large amount of media coverage, the Deaf President Now protest represented the first step for the Deaf community to become a nationally recognized minority group in the United States. Though the latest protest on the Gallaudet University campus in 2006 showed that not all of the issues regarding Deaf rights have been resolved, they have at least been gaining ground in regards to American Sign Language and the acceptance of Deafness as a cultural group in the United States, often serving as a model for Deaf groups in other countries (Bauman 2008). The open use of American Sign Language today is more than a method of communication. For active members of the American Deaf community, it represents a stand against the century of repression and an assertion of Deaf cultural identity. Many signs that were altered to English-style forms during the years of Oralism are beginning to be changed again to remove spoken English

influences. American Sign Language is going through another transformation that is a direct result of events affecting American Deaf culture.

Medical Technology and Deafness

American Sign Language is becoming more accepted in American Hearing society. Evidence of this is found in the many American Sign Language programs for Hearing students in colleges and high schools throughout the country as well as the growing number of Deaf actors and actresses and use of American Sign Language in modern media. Recently, however, the Deaf community has felt as if it is under attack again with the spread of cochlear implants and the decline of Deaf residential schools.

Cochlear implants represent a challenge not only to Deaf culture, but also to the preservation of American Sign Language (Padden 2008). The technology of cochlear implants has improved so that surgeons are now able to implant them into deaf children at the early age of six months. From a medical standpoint, this is an obvious advance because the sooner a child is implanted, the sooner that child can start to learn how to hear and the less chance of having a language delay that could stunt their intellectual growth. From the perspective of the Deaf community, however, this invasive surgery prevents the child from making any decisions regarding whether or not they would prefer to remain deaf. The problem of identity often comes up in a conversation with a Deaf adult on cochlear implants. They wonder how a child will be able to be comfortable with their dual identity. The child will be Hearing if they are wearing their implant, but the minute they take it out to shower or swim they become deaf. It also encourages Hearing

parents to send their children to mainstream schools where they are not exposed to an alternate form of culture or communication style that the child may prefer to use (Bienvenu and Colonomos 1988b).

Cochlear implants have only been a partial cause for the decline in residential schools for the Deaf. The main factor was the passing of Public Law 94-142 in 1975. This act stipulated that all students with disabilities (deaf included) could not be prohibited from receiving an education in public schools. Hearing parents no longer had to send their deaf children away to a Deaf residential school for them to be educated. The need for mainstream schools to provide education for deaf students, coupled with the unfortunately low English test scores in Deaf residential schools, caused increasing numbers of Hearing parents to mainstream their deaf children (Charrow and Wilbur 1975). With low enrollments in Deaf residential schools came less state interest to keep them afloat. Residential deaf schools across the country have begun to close.

The loss of residential schools for the Deaf has spurned a huge negative reaction from the Deaf community. For many, it was the residential school where they felt most comfortable being themselves, Deaf. Ninety percent of Deaf children are born to Hearing parents, and so for them the schools symbolized not only a place where they learned how to communicate in American Sign Language, but also a type of homeland where Deaf culture flourished. Deaf today are concerned with how younger deaf children will be able to adapt to society, make friends, and discover who they are without the support that was offered in the residential school system. Whether or not this most recent change in the

course of American Deaf history will have an impact on American Sign Language still remains to be seen.

Conclusions

Events throughout American Deaf history have provoked changes in the use and acceptance of American Sign Language. American Sign Language comes from the same tradition as other sign languages; however, its history and development are distinct. Because American Sign Language was brought to the United States for the purpose of education, it had plenty of opportunity to expand and grow when it came in contact with the American Deaf. Culture grew around the language such that American Sign Language and American Deaf culture can now not be separated.

The oralism movement served to alter Deaf culture and American Sign Language. Instead of eradicating American Sign Language and Deafness as it intended, the oralism movement strengthened Deaf culture and further rallied the Deaf around the use of American Sign Language. The resistance to oralism made American Sign Language all the more important to Deaf culture, furthering the bond between the two. As a result, American Sign Language has undergone changes in the way that signs are formed which reflect movements in Deaf culture. Oralism brought spoken English influences into American Sign Language. Once oralism began to be pushed aside, signs reverted back to their original form in an effort to remove English imposition.

The changes in medical technology today add a different dimension to oppression of the Deaf that may bring about new cultural movements that further alter American

Sign Language. The closing of residential schools and the greater use of cochlear implants in infants are not the traditional types of battles the Deaf have rallied against in the past. However, for this group of people, these current events impart the same meaning as those that took place over a century ago in Milan, Italy. Because the bond between American Sign Language and Deaf culture is so strong, the Deaf are not only concerned about losing their main form of communication, but also their way of life.

American Sign Language is inseparable from the American Deaf community. As the way for Deaf people to communicate with one another, it has lead to the development of a defensive attitude among the Deaf to the preservation of American Sign Language. The use of the language, however also has an implication on how Deaf people interact with the space around their bodies and in larger spaces. American Sign Language culture has imbedded within it unique views and uses of space.

Chapter 4

Space in American Sign Language:

Linguistic uses of Personal Space

“Space is the medium in which sign language is expressed.”

- Campbell and Woll, 2003

American Sign Language is the language of the American Deaf community. It is also a spatial language. Thoughts, ideas, words, sentences, are all conveyed through space as opposed to through the auditory signals most familiar to speakers of speech-based languages. Instead of these auditory signals, American Sign Language uses hand shapes, body positioning, location, and movement to express thoughts and concepts (Crystal 1987, Stokoe 1960). The movement and placement of different hand shapes allow for signers to utilize personal space for communication. Because personal space is necessary as the method for communicating, these small spaces take on meaning for a signer that is completely different than for a speaker. Spaces around the signer's body become significant for conveying even the most simplistic ideas. Linguistically speaking, American Sign Language incorporates an element of space within every aspect of language production, one of the reasons why it has been so difficult to create a written form of the language. Three-dimensional communication cannot easily be portrayed on two-dimensional mediums. Whereas most of this chapter will focus on the linguistic aspects of American Sign Language, I will also incorporate personal observations from

participation within the American Deaf community around the Akron, Ohio and Kent, Ohio areas. The nature of the research was such that specific names of people or content of conversations will not be discussed. However, this should not take away from the insights into different views and uses of personal space that can be learned from the American Deaf community.

Signer's Box and Sign Location

One of the first things taught when learning American Sign Language is the location in which to focus your gaze when conversing with someone using the language. Speakers are accustomed to focusing on a person's face when talking and are often surprised to learn that this is the area that they should also focus on when conversing with a Deaf person, not the hands themselves. The reason for this is because of the important information that is conveyed by the face as well as the hands. Grammatical structures, such as whether or not the statement being asked is a question, condition, or statement, are portrayed using the face. Similarly, the face can also be used to show if something is positive or negative. Because of the importance of the face to the structure of American Sign Language, focus should be on a central area of the person's body, and not just the hands.

There is a specific aspect of American Sign Language linguistic structure that accounts for the fact that the face is equally as important as the hands. This entity is known as the 'signer's box.' All signs are essentially completed within this 'box,' a specified amount of space that surrounds the signer's body like a "bubble" (Kegl 2004).

In general, this area extends forward from the signer's chest, incorporating the space from the mid torso to the top of the head and to about the width of the shoulders (a box shape). It is within this area that signers move their hands to converse and so signers are constantly aware of this space as not to block it from those who they are conversing with. The signer's box essentially becomes an extension of the person's body, an important element required for communication. The area within the box is used to communicate with other people. As Chomsky reiterates, "humans are language animals," referring to the fact that humans naturally need to have not only contact with other humans, but communication with others as well (Smith 2005). Without the use of this space, the signer's box, people using American Sign Language would be unable to have the language connection with other people. Therefore, the space within the signer's box is internalized and becomes part of the person, another element of themselves.

What is interesting about the signer's box, however, is that it can change size depending on the situation that a person is in. For example, the equivalent of becoming 'louder' in American Sign Language is to sign larger (Emmorey et al. 2009). In instances where a person is 'screaming' their signer's box would be a much larger area in order to accommodate the increased size of the sign movements. In contrast, when a signer wishes to 'whisper' the size of their signer's box will decrease and often be displaced to keep the signs hidden from view. At a picnic in Boardman, Ohio, the nice weather and great number of people made it difficult for the picnic organizers to get everyone's attention to announce raffle winners. In order to do this, one man stood on a picnic table and signed so large his signer's box was essentially the size of the whole table! In another instance,

two young women who were trying to hold a conversation unnoticed by their professor shrunk the size of their signer's box so small as to make it fit behind a stack of books on a desk. In the case of the women, the signer's box was also shifted to the side slightly to keep the conversation hidden from view. In both instances the signer's box changed in size to adapt to the situation. No matter the size of the signer's box, the space used is an important extension of the signer's body, a necessity for communication. Without this space, conversation could not take place. And without conversation, a person is unable to perform an activity that makes them human.

Signs can change size based on the size of an object they are representing. More space is needed to represent a basket that is large instead of a basket that is small. This should not be confused with changing the size of the signer's box. There are not specific signs to explain how large or small an object is. Instead, the size of the object is conveyed by showing how much space the object might take up in reality (Kegl 2004). Space is used to attempt to show size. Again at the Boardman, Ohio picnic, many people were impressed with the prizes being given away in a raffle. During a conversation with one particular man about which prize he hoped to win, he expressed joy over the idea that he might win a large basket that included a number of materials for cleaning cars. Explaining to me which prize he wanted, he showed the large basket, within his signer's box, however it appeared that the box had grown because the basket was so large. Conveying size uses a different type of space that should not be confused with the typical space used in the signer's box.

The location of a sign within the signer's box is also important. The number of hand shapes and movements that are used within American Sign Language are limited. Therefore, the number of combinations of hand shape and possible movements are not infinite. Because of this the location of a sign makes a remarkable difference in the meaning of the sign (see Figure 2). In this figure, the hand shape and movement are the same; however the location is different for each word. Specific locations near the body become associated with specific types of words. For example, the sign for boy is made near the forehead to represent the brim of a baseball cap. Other signs enacted near this location include the signs for male, nephew, uncle, father, grandfather, and son. This particular area of the signer's box is understood to contain all these terms that stem from the essential idea of male or boy, almost like a "root word." Location matters just as much as movement and hand shape when trying to convey meaning.



Figure 2: Sign Location. The three signs for summer, ugly, and dry are all performed using the same action. The different location on the body conveys different meaning. (Emmorey 1999, 171)

Personal space, and the location of the hands within that space, is essential for communication in American Sign Language. Because language is expressed with the hands, with movement, and within an area defined by the type of conversation a person is having, adequate space is required for this type of communication to occur. Personal space is extremely important in this regard as its presence allows for communication to exist or not. As such, the space surrounding a Deaf person is an extension of their body, a means to participate in a very human activity. Without the use of this space, one cannot communicate, and without communication, one cannot have a full human experience.

Time

Time, as an abstract idea, must be adjusted to fit the spatial pattern of American Sign Language. All concepts, including abstract concepts such as time, must be portrayed using space. Because of this, concepts take on a visual form of representation. A person does not just understand an abstract concept in terms of what that concept means, they also understand it in terms of the visual shape that is created to represent it. Therefore, though abstract concepts are not tangible items in reality, through communication in American Sign Language they take on the visual properties of an object. The concepts are seen and understood visually.

To convey specific types of time, there is a grammatical function known as the ASL timeline. This is a plane that extends from the front of the body and continues in a concave arc towards the top and back of the head (see Figure 3). Events that are signed in the area immediately surrounding the person's body are seen as taking place in the

present if a time has not previously been established by the signer. Events that are signed towards the front of the body are those that will be taking place in the future whereas events signed towards the back of the body are those that have already happened, essentially events that are “behind” you. The further forward or backward a sign takes place indicates how far in the future or how far in the past something will be or has been occurring. For example, an event that happened an extremely long time ago will be signed towards the top and back of the head in a larger, slower way that indicates long periods of time have passed since the event. Something far in the future, however, will be signed far in front of the body, often pushing the edges of the signer’s box.

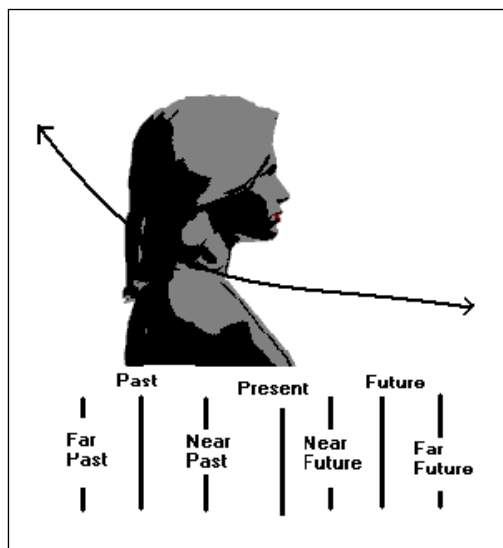


Figure 3: American Sign Language Timeline. Adapted by the author from (Alkoby ND)

In this way, time is conceived of as a laterally occurring idea. Time is literally moving in a straight line and always forward. This conceptualization of time contrasts with one of

Whorf's examples to prove how language shapes culture. He discusses how among the Hopi time is cyclical and understood as a circle (Lucy 1997). Through American Sign Language, time is seen as linear, literally, translating a different way to understand the concept of time itself. Time keeps pushing forward. People can look to the past; however, that past is already "behind" them.

Karen Emmorey theorized two other types of timelines associated with American Sign Language grammar in addition to the typical timeline explained above. The anaphoric timeline is a diagonal line used when explaining something that may have happened in the past or will be happening in the future (Emmorey 2001). Again, it involves a future-forward, past-backward relationship, however instead of the signer standing in one location and moving their hands, they actually move their body to represent the different times. In attending a lecture given by Gallaudet University professor, H-Dirksen Bauman, he utilized this technique when explaining his identity. As a Hearing man (though his lecture was given in American Sign Language), he explained how he "became Hearing." To do this, he took a step backwards and slightly to the side from where he was standing. While in this offset position, he told the audience that in his early life he did not know any Deaf people, therefore the "Hearing" label was not part of his identity. Then he explained that he met several Deaf people. As he expressed this part of his life, he slowly moved back to his original position. When he arrived in his starting position, he described how now he sees himself as a Hearing man (Bauman 2009). The stance that Bauman took while discussing an earlier part of his life, a past event, shows, physically, when the event took place: behind him and in the past. Returning to his

original position expresses his current views, literally in the present, the here and now of space and time. By shifting one's body forward or backwards, the signer gives the impression of moving back and forth from one time to another. This movement reinforces the linear interpretation of time and how time is seen by users of American Sign Language.

The other type of timeline discussed by Emmorey is the sequence timeline. This line is a literal line drawn in the space in front of a person's body on which to show the progression of events (Emmorey 2001). One of the most unique examples that I have seen of the use of the sequence timeline comes from an American Sign Language instructional video. In the example, a woman is relating her story of being in a car crash. While signing, it is possible for a signer to relay multiple pieces of information at the same time. Sign languages allow for parts of the conversation to be "conveyed simultaneously rather than sequentially like auditory languages" (Kegl 2004). Because of this, the story of the car crash explained not only what was happening to the car, but also what was happening to the woman in the car as well as what was going through her mind while the crash was taking place. At one point in the story, the woman explains how, in English translation, "her life flashed before her eyes." To do this she used her signing space to draw a line representing her life. As she was moving her finger along the line, she stopped at various points and reenacted what each point meant. At the beginning of the line she stopped and showed herself as a newborn, later down the line she stopped and showed herself graduating from school, until she reached the end of the line where she expressed fear over the fact that the line might abruptly end. While this example does

illustrate time, it is not doing it in the traditional sense. Instead of referring to events that have happened or are going to happen, the woman telling the story is using space to convey the abstraction that is her life. She is using the space in front of her to lay out the events in her life in a chronological way, showing her audience what was passing through her mind at what she thought was a near-death experience. By laying out the idea of her life in this fashion, she is giving her receivers mental images of those that flashed through her head so that they may see and experience exactly what she saw. The whole concept is conveyed in the most visual fashion. The woman had a visual experience and through space is able to convey the same visual experience to those who are watching her.

The idea of time is a very abstract and human-created concept. Expressing it visually alters the way that it is conceptualized. Deaf people and other users of American Sign Language see, both literally and figuratively, time as linear. Events in the past occur behind a person while events in the future take place in front. Signers can “jump” through time by moving their bodies to these abstract spaces. Other aspects of time can be expressed linearly in front of a person, as a timeline would be drawn on a piece of paper. Because time is one of the most fundamental ways that people understand the world around them, it is important to know how different language users comprehend time. For people communicating in American Sign Language, time is spatial in the sense that one can move to an earlier or later time depending on the location of the hands and the location of the body itself.

Topological Space, Pronominalization, and Spatial Verbs

All signs are produced in signing space, the signer's box. This use of space allows for one fundamental difference to exist between American Sign Language grammar and the grammars of spoken languages: pronouns are represented within space and verbs are carried out through space to show relationships (Liddell 1995). Pronominalization (the use of pronouns) in American Sign Language allows for spaces near the signer's body to represent persons, places, or objects and from which other verbal relationships between them and the signer can be established. These spaces, once the representation has been made, also allow for an American Sign Language version of direct quoting. It is within this aspect of American Sign Language structure that space takes on a unique quality – it becomes personal, embodied within the person who is communicating.

Liddell named the type of spaces used for pronominalization loci. A locus can be used either in regards to topographical space or surrogate space. If a sentence is topographical, it is using the space immediately in front of the signer's body to explain an event that occurred in space. The "use of space to directly represent spatial relations" is a unique feature to any type of visual language, especially American Sign Language (Emmorey 1999). Topographical sentences can range from the description of the contents of a room to the locations of people and animals around a park to a full blown explanation of an average day on the African grassland plain. When describing a room, for example, the signer generally positions themselves at what would be the doorway, and then uses the space in front of themselves to show where everything is located within the room. The room is laid out in front of the signer, as it would be on a tabletop. While I

was volunteering at a Deaf game night, the organizer of the event asked me to space out some tables around the room for various activities. To do this, she “drew” the square room in front of her and then showed me where she wanted each table to go. Because she was showing me the exact location of the tables, much like a person would draw a diagram on a piece of paper, she was also able to show the orientation of each table as well. Afterwards there was little confusion about how exactly she wanted the furniture to be arranged.

Topographical space can also be used to show how an action occurred, such as a car moving. The car can be described using a one-handed handshape and then moved through the space in front of a person. If the road was winding, the car can be shown to have swerved back and forth, or if the road was hilly, the car can be shown to have gone up and down. All of this information is shown using the hand, representing the car, through the topological space in front of the signer. Because of the ease within American Sign Language structure of showing spatial relationships and specific actions, understanding the language becomes similar to interpreting a picture. Communicating through picture formation will lead people to see the world around them much differently. Visual details are remembered easier. Peripheral vision is more astute in order to be able to relay back later the exact scene where an event occurred (Bahan 2008). Deafness is not defined by a lack of being able to hear the environment, but rather as being able to see one’s surroundings more fully.

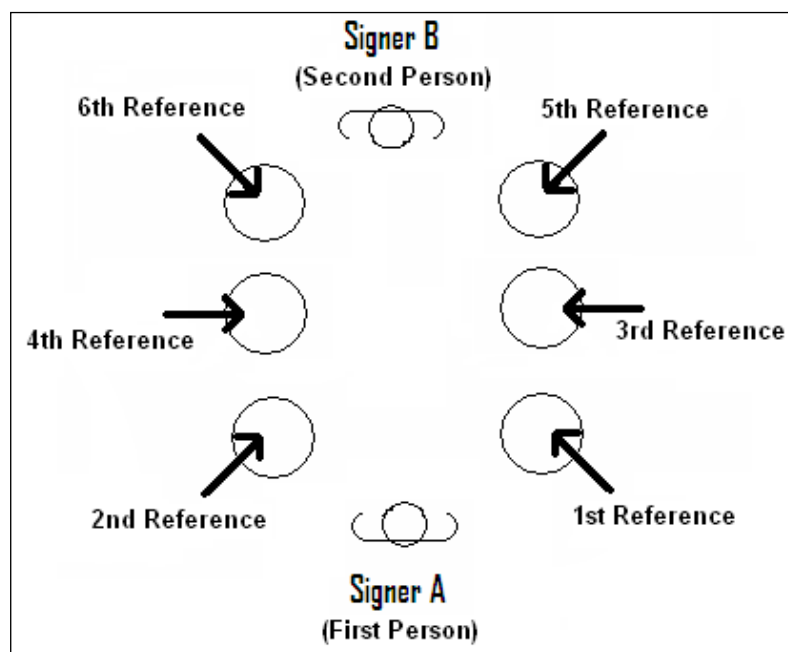


Figure 4: Loci of Pronoun References. Diagram by Author

A locus can also be a specific point around the person's body used to represent a person, place, or object (Liddell 1990). The typical areas used for representation are outlined in Figure 4 above. The signer identifies themselves with the first person point of view. The person(s) who the signer is communicating with are identified with the second person point of view. Other references in space are given the third person perspective. Typically the first third person reference is established to the immediate right of the signer, although if the signer is left handed the reference will be more likely on the immediate left. Each additional reference is then put in various locations around the edges of the signer's box. Though there is not a specific order in which spaces are used for referencing, Figure 4 outlines one common configuration for pronominalization.

After these references, or loci, have been established, the richness of how personal space is used in American Sign Language begins to unfold. If one of these spaces is being used to represent a person, the person does not need to be physically present in order for both the signer and their addressee to talk about them. All that needs to be done is to point to one area around the body and sign the name for that person. Though the person is not physically there for the conversation, they are included in the space surrounding the people who are signing (Neidle 2000, Valli et. al. 2005, Emmorey and Reilly 1995). The space will also remain designated as being the referred to person for the remainder of the conversation. In this way, both the signer and the addressee can refer to the third person simply by pointing to the space.

After a space has been designated to represent a person, other structural elements can occur. What Liddell refers to as surrogate space is also commonly known as the process of “role-shifting” (Liddell 1995, Padden 1990). This linguistic idea is similar to a direct quote in a spoken or written language, but takes on not only the actual words which the person used, but their emotions and actions as well. The third person reference space is understood to be not only representing that person, but often to be the actual physical entity of the people themselves. In order to perform a “role-shift” the signer physically shifts their body into the space that they have previously designated as a person. Once they have done this, the signer essentially has “become” the person the space was representing. Whatever is signed while the signer is in this position indicates something signed or performed by the third person reference. The intricacies of this movement are clearly seen. Because of the grammatical nature of the face as well as the hands, a signer

could show not only what a person has communicated in the past, but also how they communicated it through their emotions, their exact actions, and their spatial relation to other people or objects. Again, likened to a picture or even a film, the addressee understands what the third person is conveying or doing through the medium of the original signer. If several third person referents have been established, entire conversations can even occur between two people who are not present. A simple exercise used in American Sign Language classrooms involves having a student act out a scenario in which they are trying to convince their parents to let them buy a car. The student can shift back and forth to represent both parents as well as themselves as they argue over whether or not to let the student purchase the car. Depending on how many people are involved in the story, it can get confusing to the amateur to remember where and when to shift!

The implications that communicating by shifting into surrogate space has on bodily image are huge. If the third person reference has been described (or is mutually known) the signer taking on that position is seen, not as themselves, but as the other person. The mental image produced is not one of the original signer, but of the reference, almost as if the addressee was with the reference instead of the signer. In this sense, it is also easy to tell stories with fictional characters. An exercise I performed once was to retell “The Little Red Hen” by myself using a reference position for each of the characters. At the beginning of the story, I had to explain which character was in which space and describe the characters (a hen, a duck, and a goose). As I proceeded through the story, whenever I moved into one of the character’s spaces, I embodied that character.

The audience saw me as a hen, duck, or goose, depending on which space I was standing in. Physical traits are important for establishing who each reference is. The physical traits of a signer are important only as long as they have not shifted into the surrogate space of a referent and taken on the referent's traits.

Another linguistic element that can be utilized after establishing third person referents is spatial verbs. Unlike some verbs such as eat, work, or do, spatial verbs have some sort of relationship. Examples of spatial verbs include ask, go, give, write email, or fly on an airplane. These verbs imply that the signer is involved with another person or place in order to do the specific action. Once a third person reference has been made, these verbs can be used. For example, imagine that the signer is a teacher and they have established a locus to represent one of their students. If the signer gave a paper back to the student, the verb "give" would be done in a direction coming from the signer and moving toward the space for the student. In this case, the movement shows who is giving to whom: the teacher gave to the student. If the student asked the teacher a question, the signer would perform the verb "ask" in the direction from the student towards the teacher. These verbs can also be performed between several third person references. Maybe the signer is another student in the class. They could then designate one space to represent their teacher and another space to represent their classmate (the student from the first example). When explaining how the teacher returned the paper to the student, the verb "give" would move between the two reference locations, from the teacher space to the student space.

When using spatial verbs, the referents are still thought of as being physically present in the space, not as the space itself. Therefore, location of the sign again matters. If the reference is in reality taller than the signer, the verb will be directed upwards from the signer to where the referent would be in reality. The opposite would be true if the third person were shorter, such as a child. Location of the third person within their surrogate space is also important. If the third person reference is indicating a cat, but the cat is in a tree, all spatial verbs are directed from the signer upwards to the cat, as if the tree with the cat in it is physically present. If the referent is in the bottom of a hole, the signer would direct verbs downward, looking at the person as if they are actually in the hole and the hole is next to the signer. This point is important as it again reiterates the idea of a creation of a picture in order to communicate. While words are being used, the way in which they are used is conducted by movement through space. Words are mediums for the creation of visual pictures that lend themselves to visual communication.

Spaces can also represent places such as a building, store, city, or country. In this regard, a signer could say that they are flying to Los Angeles, California and then driving up the coast to Portland, Oregon, as one of my previous professors relayed to me about his summer vacation. One of his references he established stood for Los Angeles and another for Portland. He moved the verb “fly on an airplane” from himself to Los Angeles, and then he used the verb “drove in car” from the Los Angeles space to the Portland space. In this way I was able to visualize his vacation and the method of travel in one motion. Though I understood that Los Angeles and Portland were not that close together (and certainly not close to Kent, Ohio!), by using the loci to represent these

locations, my professor could easily convey where he was going and how in a short amount of time. In my earlier reference to the retelling of “The Little Red Hen” I had spaces representing important places in the story: the mill and the farm. When the hen went from one to the other, it was easy to visually show her path between the two locations. My audience also understood the hen to be moving between the two locations, visually close together in my signer’s box, but in the reality of the story, separated by a day’s walk.

Loci, topological space, and surrogate space are the most unique elements to American Sign Language that separates it from other spoken languages. Their use allows for Deaf people to convey complex spatial relationships fairly easy and without confusion. They also make it possible to direct quote other people who are not present by signing not only the conversation, but also using emotions and actions. In this way, the audience can visually see the third person and understand what they were communicating. Like a film, conversations that utilize surrogate space present a picture described with words to the audience. People using American Sign Language for communication visually understand how events occurred and what conversations look like. Events happen through action and vision in the world, and through American Sign Language this is also how they are communicated.

Conclusions

American Sign Language is a spatial language. The linguistics allow for elements of conversations to be carried out and performed through space. Therefore, the personal

space surrounding a signer becomes a fundamental part of their being. The extension of space in front of a signer, the signer's box, can be seen as an addition to the person themselves, a part of them. All signs are conducted within this space. Abstract concepts such as time are relayed on a spatial plane. Understanding time in a linear fashion lends itself to a unique way of understanding actions and events. People, places and objects can be represented in a signer's box using surrogate space. In this way, pictures are drawn using words expressed through signs to show the physical traits of others as well as the actions, emotions, and spatial relations between them. Signer's can embody another person, animal, or object to explain conversations from a more intimate and omniscient viewpoint. People who use American Sign Language to communicate bring a different understanding of people as well as a more visual interpretation of events to their conversations. To communicate is to be human. To communicate in American Sign Language is to use space. Without the space around a body, communication would not be possible.

Chapter 5

American Sign Language in Space:

Proxemics and the American Deaf Community

“Proxemics is the term I have coined for the interrelated observations and theories of man’s use of space as a specialized elaboration of culture.”

- Edward Hall, 1982

The preceding chapter focused on linguistic uses of personal space for the purpose of communicating in American Sign Language. Personal space was explained to be an extension of the self, a part of the person’s body necessary to communicate with others. As such, this space needs to be readily available for a persons’ use. If this space was to be blocked in anyway, communication would also be blocked. Deaf people and other users of American Sign Language have developed ways to arrange not only themselves, but also their surroundings to best allow for their personal space to be open for communication. The field of proxemics developed by anthropologist Edward T. Hall studies how different cultural groups use the space around them and alter their surroundings in order to communicate effectively. While the study of proxemics is fairly unexplored, it has focused primarily on those people of speaking cultures instead of communities like the American Deaf. This is a great oversight because of the unique needs of this linguistic group to maximize the visibility of their bodies. As we have seen, the American Deaf culture is completely tied to American Sign Language. Due to the fact

that American Sign Language is a spatial language and requires the use of personal space, the American Deaf culture has developed to include specific ways for people to situate themselves and their surroundings. This cultural attitude has even been extended in recent years to include a Deaf architecture movement and a project at Gallaudet University known as DeafSpace which incorporates Deaf attitudes towards their surroundings.

Proxemics: The Senses and Arrangement of People

A textbook definition of proxemics would be the “perception, use, and structuring of space as communication” (Burgoon et. al. c1996). However, when Hall created the terminology, he had a broad set of ideas in mind for which proxemics could refer. Much of his initial analysis dealt with how different cultures use their senses differently, specifically sight, smell, hearing, and touch (Hall 1982). Being Deaf, the American Deaf community also has very unique ways in which the uses of their senses are utilized for communication purposes. Smell and hearing are minimized in the Deaf community, while sight and touch are maximized. Touch is important for getting people’s attention when one is not looking or it is dark. A tap on the shoulder is understood to be a familial act, one used to alert each other to peoples’ presence. Touching the shoulder is also a difficult act for new members of the Deaf community to get used to performing. To members of American Hearing culture, it is seen as crossing the boundary into “intimate space” – the space of close friends and family (Hall 1982). I recall a moment where I needed to get my American Sign Language professor’s attention. He was a gentleman much older than me and it took some courage on my part to reach out to touch his

shoulder. However, he reacted completely normal as I did this because he knew that I was simply trying to get his attention in order to explain something to him. There are some instances where touch is considered to be a negative act, one of invading personal space. Touching or holding a person's hands while they are signing evokes emotions of persecution. Many Deaf were prevented from signing while growing up and were punished by being forced to sit on their hands (Bienvenu and Colonomos 1985). Touch has powerful meanings within American Deaf culture as it can mean inclusion or exclusion.

Sight is also clearly important within Deaf culture. To be able to see is to be able to participate more fully as a human within society. Sight is so important in fact that it has led many Deaf people to refer to themselves "first and foremost as people of the eye" (Bahan 2008). Studies have been done to prove that Deaf people *see* the world differently, that they are more in tune with their surroundings, and that they have more developed peripheral vision. Stories have been told about how Deaf people can pick out other Deaf people in a crowd because of the way that Deaf people move their eyes and survey their surroundings. Many Deaf also discuss how they can "hear" sounds from the way that Hearing people or animals look when they hear the sound themselves.

The importance of sight has translated heavily into Deaf culture and therefore been incorporated into Deaf proxemics. The need to see and the need to be seen is a cultural value expressed through Deaf use of space. Always aware of their signing space, Deaf will organize themselves within their surroundings to maximize the visibility of the signer's box. As such people who are conversing with one another will tend to stand far

enough away from one another to allow for signs to be performed. They will also arrange themselves more likely in circles as opposed to straight lines so that sight is maximized. When attending a picnic in Boardman, Ohio for the local Deaf club, this pattern was clearly visible. People would most often stand instead of sit to converse because the benches connected to the picnic tables interfered with the signing space. The only time people sat was when eating or when they could face outward, away from the table itself. Later in the night, a raffle was held. In order to announce the winners, the announcer had everyone move out from underneath the picnic pavilion and stand in a U shape. By standing like this, the announcer could easily stand at one end of the U and sign the numbers from the winning raffle tickets while everyone watched him. The line of sight for people is maximized using a U shaped arrangement. At a different event, an American Sign Language (ASL) Idol competition in Westerville, Ohio, people milling around outside the auditorium before the event were grouped in circles. By standing in a circle, each person could easily see one another and therefore be involved in the conversation that was taking place. Each person was aware of the others' signer's boxes and moved their bodies accordingly.

Many times, the best way for people to see you is if you elevate yourself so that you are taller than the people surrounding you. This type of behavior is seen repeatedly throughout the American Deaf community. Deaf people will use whatever is handy to them to raise themselves a couple feet in the air so that the signer's box is visible. At the picnic in Boardman, Ohio, one of the organizers stood on a picnic table to get everyone's attention and explain some of the games that were being organized for participants. On a

tour of Gallaudet University, the tour guide brought his group over to a set of stairs so that he could climb several of them and gain the height necessary for him to be the most visible. At a game night at Signs of Grace Church, the announcement of birthdays for the month was made by a woman standing on a chair in the middle of the room after she had made everyone else present take a seat. At a Deaf scavenger hunt in Aurora, Ohio, the rules were explained to the teams assembled by the judge who stood on top of a low-lying cinderblock wall on the edge of the park's parking lot. Line of sight is vital for communication, so much so that people using American Sign Language will strive to position themselves in the best location available for their addressees to be able to see them.

Walking and conversing is an interesting task when using American Sign Language. The space requirements for the language force people to stand a certain distance away from one another. Because of this, narrow sidewalks and stairs are not always the most favorable places to have a conversation in American Sign Language. Whoever is not signing must be aware of surroundings and warn the signer if he or she is about to run into something, such as a curb, bench, lamppost, ditch, or street sign. Small sidewalks often force one person into the street while walking, creating the potential for even more dangers (Byrd 2007). Under these conditions signers must adjust themselves in order to communicate and still see one another. While on a tour of Gallaudet University's campus, the tour guide had an English translator with her. The tour guide would walk backwards and sign the information that we needed for the tour. The translator would walk near her and warn her if she was approaching something and

needed to move. In this way, the two worked together so that conversation and walking could both take place.

Another instance where people moved their bodies in order to conform to the space requirements needed for conversation was at a lecture given by H-Dirksen Bauman at Kent State University. Bauman, a Gallaudet University professor, gave his lecture in American Sign Language. Because of this, he had to arrange himself on the stage so that the entire audience would be able to see him while he discussed issues of Deafness and Audism (discriminating against people based on ability to hear). To do this, he moved away from the podium and stood in the center of the stage at the very front. Because the stage lighting was not set up to accommodate this type of presentation, the auditorium lights had to be kept on while he was giving his lecture. The way that Bauman arranged himself is in stark contrast to the way in which Hearing speakers have arranged themselves in the same theater at Kent State. Most will stand behind the podium, to the side of the projection screen where their presentation is being given in PowerPoint format. Bauman did use a PowerPoint, however he still felt comfortable moving across the front of the stage to make himself the most accessible to his audience. Sight was the most important consideration of the spatial arrangement of his body when lecturing.

Distance is another key factor when discussing sight. Hall identified a series of distances related to communication and proxemics. Certain distances, such as those that are very close up, are reserved for more intimate conversations usually between close relations, others are reserved for public conversation such as those between people who have just met or who are total strangers (Hall 1982). When Hall did his analysis,

however, he only considered spoken languages, those that were bounded by sound. Sound can only carry so far and cannot carry as far as vision. Users of American Sign Language are not bounded by sound, but instead by vision, making communication distances for the American Deaf community much different than Hall had in mind in the 1960s. Because distance is not as much of a factor when communicating in American Sign Language, conversations can take place much further away than when speaking. For example, it is much easier to converse across a crowded room using American Sign Language than speaking. When I was at the ASL Idol competition in Westerville, Ohio, I often saw people having full conversations across the auditorium from one another. One person would be standing at one end of a long row of seats while the other would be standing at the other. Because the people in between them were sitting, there was nothing to obstruct the conversation of the two people standing. Distance and sight also allows for many more people to participate in a conversation at once. It is fairly common when at a public Deaf event for a person on a stage to ask a question to the audience and expect to see a reply. When attending events such as the lecture given by Dr. H-Dirksen Bauman and the ASL Idol Competition, presenters on stage would ask the audience a series of yes or no questions then look out into the audience. The audience could easily respond to the questions by raising their hands in the air and signing the appropriate “yes” or “no” sign. It is much easier to see and understand a group of people performing something at once rather than hearing them all speaking at the same time.

Related to sight is the idea of light. In order for people to be able to see one another, there must be enough light. As such, light and entities that allow or create light

are highly valued by the Deaf community. Deaf people will often congregate around windows or lampposts to maximize the amount of light and the amount of visibility to one another. Deaf people report standing outside on street corners long after being at an event, huddled around the streetlamps in order to see. There is even an outstanding joke in the Deaf community, “What do Deaf people and moths have in common?” (Bahan 2008). The need for light to communicate was seen clearly when I attended a Deaf game night at Signs of Grace Church outside of Cleveland, Ohio. The organizer of the event told me at the end of the night we would have to push to get everyone to leave as Deaf people love to socialize when they get together. Curious as to how she planned on doing this, I stayed to watch. The room where the event was being held was at the rear of the church. To get the people to start heading towards the door, the organizer slowly began turning out the lights. As soon as all the lights were out in the game room, most of the Deaf people had moved into the hall adjacent to the room to keep their conversations going. The event organizer then began to shut off the lights in the hallway, slowly forcing those still involved in conversation to move towards the door. Finally, all the people had been pushed to the entrance way where a street lamp from the parking lot lit up the area. Eventually, people moved their conversations outdoors under the parking lot light and we were able to lock the church door! The absence of light forced people who were using American Sign Language to communicate to seek new areas that were better lit. The arrangement of Deaf people in space has as much to do with the availability of light as it has to do with the necessity of sight.

Being in tune with one's senses is a large part of the study of proxemics. Because American Deaf culture relies on American Sign Language for communication, vision and touch are the most important senses. Their value has been shown through everyday interactions as well as through art and story. Aside from the senses, the most basic form of proxemics is that of the arrangement of the body. People need to arrange themselves in such a way as to be conducive to their communication techniques. For American Deaf, this involves changing their bodily position to maximize vision of the signer's box and line of sight from the person signing to their audience.

Proxemics: Arrangement of Surroundings

Proxemics not only deals with how people arrange themselves and use their senses while communicating; it also deals with how people prefer to adjust their surroundings to best fit their conversational needs. Hall again discusses how this spatial arrangement of furniture varies by culture, but is concerned only with speaking and hearing cultures and not visual language cultures (Hall 1982). Because line of sight is so important for members of the American Deaf culture, furniture placement deals with how best to maximize line of sight. Open spaces would be the best areas for users of American Sign Language to communicate with one another; however the reality of living in the modern world means that spaces need to be able to include furniture and other objects. By altering the setting of a room, Deaf and others who use American Sign Language can create a space that is more conducive to visual communication.

Something that Hall discusses is the use of doors in different cultural groups. For many, doors are seen as something to create a barrier or allow for privacy. Hall explains how many people of German culture are appalled by the apparent flimsy nature of American doors because they allow for sound to pass through them, thus disturbing the reason for putting in a door in the first place (Hall 1982)! For the American Deaf community, however, doors are seen as negative structures and are therefore minimized wherever possible. Doors do not allow light or sight to pass through them and effectively block any type of visual communication. Therefore, in areas where Deaf people are prevalent, such as Gallaudet University, doors, and to an extent walls, are more often made of glass. Windows and glass doors allow for communication to pass through them when using a visual language, whereas solid structures bar communication. The value of windows and negative connotation of doors has even been expressed through Deaf art and become a culturally accepted norm. Doors, instead of being seen as a feature of privacy, are seen as something that prevents people from fully taking a part in society.

Many public areas are not created for Deaf people and others who use American Sign Language. They are instead made for the majority of the population who are not as concerned with making the signer's box visible to everyone whom they are conversing with. Because of this, Deaf must create Deaf space out of the spaces available to them. Mathews (2008) used this idea in her paper about how members of the American Deaf community created Deaf space in local bars in Washington, D.C. whenever they went out as a group. Though Mathews also dealt with political ideas of Deafness in an inclusion/exclusion framework, she discussed how furniture was immediately rearranged

to better suit the needs of having conversation in American Sign Language. Tables were moved to the side and out of the way so that people could sit while still allowing the signer's box to be visible to all who were in the group. Lawson (2001) comments on how it is often difficult for people to break the arrangement of furniture once it has been set up in a particular way, making it challenging in some social settings to strike up conversation or dispel feelings of tension and unease. In my own observations of people using American Sign Language, furniture arrangement has not been an issue. Deaf accept the fact that most public places are not designed according to standards of visual communication and will therefore need to be altered. They do not seem to be concerned with changing the basic structure of a room. Classrooms are an obvious example for this as they are generally designed and set up in a specific way and for a specific purpose. There is usually a table up in the front of the class for the professor to use. Behind the table is a "sufficient" amount of space for the professor to walk around and write information on the board. These tables were a nuisance to my Deaf professors who would push them out of the way as soon as they entered the classroom. Another issue was the overhead projector. Not all of the classrooms had a projector built into the ceiling. If overheads needed to be shown to the class, it was always a challenge of where to best place the overhead projector in the classroom so that it was not blocking any of the student's line of sight. Clearly, one arrangement of a space may work better for some people than others.

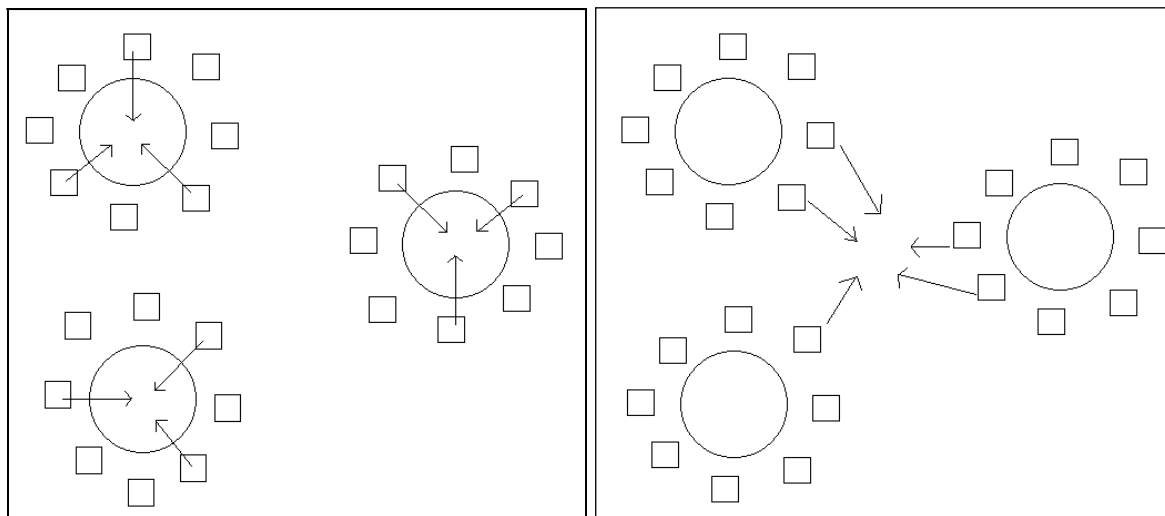


Figure 5: Centers of conversation. Left: Hearing groups of people center conversations in the middle of tables. Right: Deaf groups of people center conversations in the space between tables.

The same phenomenon of table and chair arrangement happened to me when I was helping to set up for the Deaf game night at Signs of Grace Church. The organizer of the event explained to me where to locate the furniture in the room. The tables and chairs needed to be arranged fairly specifically. They could not be too close to each other because of the need for everyone to have enough space in order to sign to one another. Once people began to arrive, it was clear why the tables needed to be spaced so far apart from one another. As everyone started to find seats around the room, the chairs were pushed back far enough from the tables so that people could sit and still have enough room to converse. The tables themselves were really only used when people were eating or if something needed to be placed on them. Though the tables were round, unlike Hearing people who would sit around the table to talk to each other, the Deaf were not interested in sitting at the table itself. The tables instead were used as a piece of side

furniture where items could be placed if necessary. The focal point of the conversation was not on the center of the table, but rather on the spaces *between* the tables (Figure 5). The areas around the outside of the tables were more open and easier to communicate in.

The same situation holds true for desks in a classroom. At Kent State University the students are almost completely Hearing. Therefore, the only instance where American Sign Language is used for instruction purposes is in American Sign Language classes. As such, the rooms are set up to facilitate vocal communication instead of visual. When in American Sign Language class, the first step is always to adjust the classroom so that it meets the needs of a visual language class. To do this the desks are always rearranged into a U shape. By shaping the desks in this manner, the instructor who stands at the opening of the U can easily be seen by everyone in the classroom. The line of sight of the students to the instructor and the instructor's signer's box has been maximized. At Gallaudet University, because a majority of the classes are taught using American Sign Language, the classrooms are already arranged for visibility. The desks are permanently placed in U shapes. If the classroom needs to be larger than one U, there will be tier-type levels behind the first U of desks. This way, the people sitting in the back of the classroom can still see the instructor and are not blocked by those people who are sitting in front of them.

Communication distance is always more of an issue at larger scale events, such as a show or a lecture in an auditorium. Previously discussed was the difference between large scale events where the presenter speaks versus signs and the presenter's use of the podium. However, another issue at larger events has to do with projection. When a

person who is speaking needs to be able to reach large crowds in a large space, they will use a microphone. This allows for the voice to be louder than previously possible. Using American Sign Language at a large event is different. Sight is most important and the stage must be arranged so that people can see the person giving the presentation, hence why people presenting using American Sign Language will not use a podium. At the ASL Idol annual event in Westerville, Ohio, the stage was set up to allow for visual communication to be transported over large distances. A camera was put up in the audience pointed directly at the person who was presenting on the stage at a given time. The footage from the camera was then projected onto a large screen in the middle of the stage. The performers stood off to one side of the stage to give their performance so that the screen could easily be seen by those who were sitting towards the rear of the auditorium. In Figure 6, ASL Idol host CJ Jones, a Deaf producer, director, and actor involved with the National Theater for the Deaf commences with his hosting duties on the far left of the stage. Though people were still able to see him, the screen was set up in the middle of the stage so there would be no doubt that the audience could understand his performance. Again, vision and line of sight are the most important aspects to consider when creating Deaf space.



Figure 6: Host CJ Jones presents at the 2010 ASL Idol. He stands on the side of the stage, allowing for the audience to see the large screen projecting him in the center.

Proxemics deals with not only how people arrange themselves, but also how they arrange their surroundings to best fit with a particular culture's communication style and needs. For members of the American Deaf community, American Sign Language is the way in which they communicate. As a visual language, the most important aspect of proxemics is line of sight. People will change how they are standing in order to be seen well by those with whom they are conversing. They will also change the space around them, creating a Deaf space in the process so that the landscape will better mesh with their needs.

DeafSpace: Architecture as Culmination of Deaf Proxemics

The study of proxemics more recently has been taken to the discipline of architecture. Not only do people need to arrange *themselves* in a certain way for communication, but they need to arrange their surroundings in a way conducive to

communication as well. For the most part, the arrangement of people and objects in their vicinity has been done within the constraints of the preexisting buildings in which people interact daily. Many architects are now taking into consideration the physical structures of buildings in order to make the structures more accessible and communication friendly. Even more recently there has been talk within the Deaf community and Deaf Studies movements about DeafSpace or a Deaf architecture movement. This movement would combine Deaf proxemics with architecture to give Deaf and other users of American Sign Language the best space in which to work and live. Structures would be built with the needs of a visual language community in mind.

The idea of the “Deaf Home” has been discussed by Deaf people for decades. A “Deaf Home” is a house that has been adapted to meet many of the needs for Deaf people. A Deaf house will usually have lots of windows to let in plenty of natural light which puts less strain on the eyes than artificial light and will allow for plenty of open space, not blocked by too many doors or walls between rooms. A “Deaf Home” will also have many conveniences for people who need to be able to complete tasks using vision. For example, the doorbell may be connected to a light above the door that blinks when someone is on the porch. Smoke alarms and telephones similarly may have lights attached to intimidate sound. Many ideas of the “Deaf Home” are incorporated into houses that are purchased by Deaf people (Bahan 2008). These houses probably were not specifically designed for Deaf people, but rather modified as in the discussion of furniture rearrangement in the section above. Today, buildings are planned to be more Deaf

friendly from the beginning, rather than redesigned to fit the needs of the Deaf community.

The first official Deaf friendly building opened at Gallaudet University in 2008. As a walking tour brochure from the school explains, the James Lee Sorenson Language and Communication Center (SLCC) is the “first building in the University’s history to be designed by and for Deaf people, through the use of architectural principles that are specific to their communication needs” (Gallaudet University 2009). Prior to the building of the SLCC, no architectural work had been designed specifically to meet the needs of Deaf people. Because of this, the design committee for the new building created a task force that met with Deaf students, faculty, and staff at Gallaudet University to ask them what they wanted to see in a building. Using basic architectural principles, they came up with several factors that should be taken into consideration when designing Deaf space (Byrd 2007, Gallaudet University 2005). Lighting is of major concern because of the necessity of sight and vision. The building must be able to use natural light, but adjust that light to eliminate harshness on intensely sunny days and maximize light on overcast days. The color chosen for the walls should also be a neutral color that does not bother the eyes, but considers the natural skin tones of people’s hands when signing. If the wall color is subtle enough it will better offset the movement of signing hands. Shadows and dark corners also should be avoided as they create areas in which it is difficult for the eyes to adjust. Open areas are preferred over closed ones. This idea translates into not only having large open foyers in a building, but also to minimize doors, walls, sharp corners, and low ceilings. The design should be flowing and full of curves rather than

edges and corners as these block off vision and hence communication between people.

Lastly, because Deaf culture and American Sign Language go hand in hand and permeate every aspect of Deaf life, the building's design should incorporate elements of Deafness, its history and values. Deaf designed space not only takes language into consideration, but also elements of a Deaf person's identity and lived experience.

While taking a tour of Gallaudet University I was lucky enough to step inside of the new SLCC building and examine, firsthand, the design elements that make up Deaf architecture. The tour guide explained to us how the building was built using input directly from the Gallaudet community, making it a building not only innovative in terms of Deaf architectural style, but also in terms of how the design was created. Figure 7 and Figure 8 below give a better perspective on what the building looks like. In the first picture in Figure 7 we can see how many of the design elements, such as use of open space and curves, were used to create this building. The rear wall was made almost entirely of glass in order to let in as much natural light as possible to enhance vision and visual communication. Another lighting element exhibited in this picture is the electric lights along the walls of the hallway. The lighting fixtures were made to project light toward the ceiling and reflect it out into the room. This design not only allows for a softer light that is less harsh on the eyes than overhead fluorescents, but helps to reduce the number of shadows that are cast in the room. Lastly, Figure 7 depicts how walls were minimized by using half-walls made of glass around the second and third floor hallways. The area is open and easily viewed by everyone who is standing in the entrance way and

upper floors. The line of sight has been sufficiently maximized in this building for the purpose of visual communication.



Figure 7: The SLCC Building at Gallaudet University: the first Deaf friendly building

The second picture in Figure 7 shows how corners and sharp angles have been eliminated from the area for the purpose of communicating in American Sign Language. Corners block communication. It is difficult to see around corners. People cannot sit on a corner and see everyone in the group. Sharp angles also make an area seem more closed off and not as open. In these two pictures in Figure 7, it is easy to see how the curved walls make the area more visually open and appealing. The designers of the building

even went so far as to incorporate structured furniture into the landscape in the form of a curved bench with an upper ledge. Sitting at a bench like this would allow for a conversation without blocking the signer's box. If a person needed to set something down, they could easily do so behind them where the conversation is not taking place. Nothing would impede the line of sight between people who are conversing in American Sign Language. The bench also provides enough space in order to be sufficiently apart from one another for signing to occur without intruding on one another's signer's box. Figure 8 shows the elevator of the building directly across from the main entrance doors. Even Deaf design principles have been used here. Doors and walls have again been minimized by using glass. While this would allow for conversations to take place between a person in the elevator and a person on the ground floor, the intent of the architect was probably to keep the open feeling of the space.



Figure 8: Elevator in the SLCC: Deaf design principles were even utilized here!

The building of the SLCC and incorporation of ideas from students, faculty, and staff into its design has sparked a movement on the Gallaudet campus known as DeafSpace. Led by professors in the Deaf Studies department, this movement strives to further the study of Deaf spaces and Deaf architectural design principles (Making Connections 2009, Byrd 2007). So far students in classes have worked on projects that show how best to redesign many elements of campus including dorms, the library, the student center, sidewalks and green-space. Many of their efforts have paid off with the newest design project scheduled: the rebuilding of one of the dormitories in a Deaf friendly style. Other projects are reaching outside of the Gallaudet University environment. The Washington, D.C. city council has provided funds for a twenty-four acre area just west of the campus to be redeveloped. Because Gallaudet University is the largest landowner in this project (owning about 3.7 acres) they want to use their influence to take the DeafSpace concept to mainstream society. Many involved with the project hope to establish a Deaf friendly environment in this area with the possibility of building a Deaf art museum and apartments for retired Deaf people. A new initiative on the campus to create an urban studies department also hopes to get involved in the development project. Soon Deaf people may not have to change their surroundings to fit their needs within Hearing environments. Buildings may be designed which take into account the needs of people who use visual communication. Line of sight and enhanced vision indoors are valued by the American Deaf community. However, they are also standards that could improve the communication strategies for other cultures as well.

Proxemics and Deaf culture have been combined into a new architectural movement known as DeafSpace. This movement has been going on at Gallaudet University since the initial designs of the SLCC building were drawn up in the early 2000s. Principles of DeafSpace are beginning to be used in areas outside of a Deaf environment in the D.C. revitalization project. Deaf have for too long rearranged themselves within Hearing spaces in order to meet the visual demands of American Sign Language communication. Now they are on their way to developing spaces of their own.

Conclusions

Proxemics is the study of how people arrange themselves and their surroundings for the purpose of communicating with each other. The ways in which people have developed certain spatial arrangements is largely tied to culture and to the language that each specific culture group uses. The American Deaf community has unique ways of situating themselves within space because of their use of a visual and spatial language, American Sign Language. When conversing in American Sign Language, it is of utmost importance that the signer's box be visible to those with whom you are conversing. The need to see one another causes Deaf people to arrange themselves and their surroundings based on vision and line of sight. Furniture is often pushed out of the way or people will move themselves for maximum vision. Recently, the proxemics of Deaf people have been incorporated into a Deaf architecture movement called DeafSpace. This initiative strives to better utilize and build new environments that are better suited to the demands of

American Sign Language Communication. Permanent structural changes are being made to conform to visual communication demands.

The American Deaf community highly values sight for the purpose of being able to communicate with one another. However, they also value space. Spaces that are open are more successful at generating conversations in American Sign Language. The connections between Deaf culture, American Sign Language, sight, vision, and space are intertwined. Each element relies on the other to create a cultural attitude that has been explored little by geographers. Understanding new spatial ways of thinking can only enhance the discipline of geography.

Chapter 6



Figure 9: The opposition between the Hearing World and the Deaf World. Why can't we have both?
http://blog.lib.umn.edu/garr0232/architecture/2006/10/opposition_between_deaf_world_1.html

This thesis began with a discussion of language. All languages are different. They have developed due to unique circumstances that have allowed them to create a diverse system for humans to communicate with one another. Languages affect how we see and ultimately interact with our surroundings and each other. Geographical phenomena have often been the cause of language development. Languages are used in some ways to explain a person's surroundings and events associated with them. As a result much of language is created in order to explain incidents in a person's immediate location. Because languages reflect the culture and environment of development, people are limited in what they can explain in their particular language. If something has not occurred in the setting in which a language was created, then there will not be appropriate terminology in that language to describe it. Often people have to substitute words from other languages to supplement their own in order to bring in new ideas and concepts.

Ultimately, humans need language to convey ideas, however language is limiting. A person can only convey what his language allows him to express.

Though we have limitations on ourselves because of what language we use, humans still need to communicate. Part of fully being human is communication with others. Think of people who are in isolation. Prisoners are given “the silent treatment” and put into solitary cells where they cannot communicate with other people as a punishment. It is possible to simply survive under these conditions, but to live and have human experiences we need to be able to communicate with others. Language is essential for creating connections between people.

People live and interact with others in space. Therefore, their actions are played out through the spaces that they inhabit on a daily basis. There are many different types of spaces. People have eating spaces, sleeping spaces, working spaces, and playing spaces. They also have communication spaces. Whenever someone is having a conversation with another person, the space that they are in becomes a communication space. Because most of the languages used on Earth are based on a system of auditory signals relayed from the vocal cords of one person to the ear canals of another, we tend to think of communication spaces as those areas bounded by sound. In an auditorium, we have technology in the form of microphones to enhance sound. In the dark corner of a restaurant, nooks are created to keep sound from moving too far away from intimate conversations taking place. People think of communication and they think of sound.

Proxemics research gives us a different way to think about languages and communication. Hearing is not the only one of our senses that we use during a

conversation. We use sight to watch the gestures of individuals. We use touch to show how connected we are to one another. We use smell to invoke memories and other past experiences. Communicating with other people goes beyond the immediate experience of hearing another person. For the American Deaf community this statement could not be more true. For this group of people, communication is tied explicitly to sight. Relying on their eyes instead of their ears, American Deaf have a way of communicating with one another that is totally unique from the way that most Hearing people have conversations. But what does this tell us about the way we communicate and communication in general?

Space is understood in a completely different way for the Deaf than it is for Hearing people. Because humans need to use space to communicate, the type of communication will affect the way in which space is utilized. People who use American Sign Language understand communication space completely differently than people who use a spoken language. For them, everything comes down to the eye and vision. Their communication space is bounded by line of sight, light, vision, and access to space around their bodies. If any of their personal space is blocked or if they cannot see one another it prevents them from having a conversation, from being able to share their experiences with each other. This need to use vision for communication affects every aspect of a Deaf person's life. Trying to find enough light to see is enough of a motivator for Deaf people to move their conversation space around. Making sure people have enough space to have a conversation is also key for American Sign Language. Surroundings and people will be rearranged so that personal space is most visible. Conversations in American Sign

Language simply cannot take place if people cannot see or do not have enough space in which to perform and observe the movement of signs.

To more fully understand the importance of communication space, recognition and understanding of different ways to communicate are needed. Just like we limit ourselves by what language we use, we also limit ourselves by what senses we use when we communicate and how we choose to communicate. Using American Sign Language presents a different way of having conversations with other people. It also presents a different way of arranging ourselves and our surroundings. With the recognition of Deaf communication space, we can tailor our surroundings to meet the needs of both visual and auditory people. By doing so, we can become more accepting of all forms of communication. The benefits of arranging space to fit all people's needs are enormous. One of the greatest challenges to overcome when encountering someone who uses a language different than your own is to understand the culture with which it is associated. We have seen that American Sign Language is tied to a specific culture group, American Deaf culture. If we start to understand our surroundings better, as well as the surroundings of American Deaf, we are one step closer to understanding the cultural needs of a group of people different than our own.

Knowing the spatial implications of American Sign Language is not just about understanding a different culture. Knowing American Sign Language is also about creating new ways to experience life, new ways to communicate, and new ways to enhance the human experience. By existing in an auditory world where conversations rest only on speech and hearing, we limit ourselves in how we can communicate and how we

can share information with other humans. For most of us, communication means listening with our ears, hearing what others have to say, and providing responses with sounds. If this is all we know, we are limited. If this is all we strive to know, we are preventing ourselves from having a full human experience. Living with five senses does not mean that we should only use one or two. The more of our senses that we use, the more fully we as humans can understand our world and gain appreciation for what it means to live. Communication does not have to only exist in the auditory realm. It can be visual as well.

American Sign Language can teach us many things. The language can teach us to be more aware of our personal space as the extension of ourselves. American Sign Language can teach us to embrace other people's emotions as our own and to become someone else by taking up their characteristics or "embodying" that person. The language can also show us how to look at our surroundings from a visual perspective. We can learn to better see the richness of detail around us. We can change how we live to increase our visual understanding of what is around us. American Sign Language can give us the means to develop a deeper understanding of micro-scale and communication spaces. But most importantly, American Sign Language can teach us to live a well-rounded life. By using all of our senses to the fullest ability, we will no longer be limiting ourselves. We can push beyond what we know to experience other aspects of communication we may not have thought possible. American Sign Language is a visual and spatial language and as such provides a perspective on the world that is also visual and spatial. Knowing and using American Sign Language enhances human abilities to communicate.

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