Children’s Perceptions of Gender
as Studied Through Pronoun Use
by
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A Dissertation Presented in Partial Fulfillment
of the Requirements for the Degree
Doctor of Philosophy

Approved May 2011 by the
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ARIZONA STATE UNIVERSITY
August 2011
ABSTRACT

Gendered language has been a topic of study for centuries. The most recent efforts to promote inclusive language have been championed by parents, teachers, and social reformers over the last thirty years. Replicating in part a research study that was done over thirty years ago, this study examines what effects have taken place in children’s perceptions of male and female roles in regards to specific activities and occupations and how their perceptions compare to the current work force, what role children’s literature has played in these changes, and what children’s natural speech in describing personified animals can tell us about their subconscious gender labeling. The results were remarkable in two ways: native language evidently exudes little emphasis on pronoun choice, and children are more readily acceptable of gender equality than that portrayed in either Caldecott winning children’s books or real life as seen through current labor statistics.
DEDICATION

As with all endeavors, this one could not have been accomplished without the love, encouragement and support of several special people. Thank you to my parents, children, family, friends and my Savior. This work is dedicated to my husband, Jonathan, who for years has said he looks forward to being “Mr. Dr. Arter.” I love you.
ACKNOWLEDGMENTS

I gratefully acknowledge the cooperation, encouragement, and help of the students and staff of Frank Elementary School, Guadalupe, Arizona. Particular thanks to Principal Bernadette Kadel, librarian Teresa Rozzi, Language Arts coordinator Susan Quihuis-Bell, and classroom teachers Ashley Corbett, Katie Gelo, Rachel Holderbach, Justin Jensen, Megan Lamb, Jessica Leister, Jenna Marlis, Theresa Murillo, Suzann Sabin, Linda Slack, Teresa Strickling, and Jason Vander Kamp.

To Dr. Alleen Nilsen, who advised me through my coursework, chaired my committee, listened to my ideas, and supported my work with collaborative writing and presentations.

To Dr. James Blasingame, for his perspectives on children’s literature.

To Dr. Judy Grace, who gave me my first university job and taught me about real research.

To Dr. Sarup Mathur, who helped me understand the meaning of partnership.

To my colleagues at Arizona State University, especially Laura Atkinson, who listened to ideas and offered suggestions and encouragement.

To my colleague and friend, Rebecca Sandhoff. I miss you.
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INTRODUCTION

Each person’s gender is determined at the moment of conception. From birth, that gender becomes reinforced through social differentiation. Our first blankets, diapers and hospital wristbands are color-coded: girls placed in pink and boys bundled in blue. For most, our clothes, hair styles and mannerisms proclaim our genders based on culturally constructed sex-appropriate categories. Even parents who try to diminish the gender divide by decorating the nursery in greens or yellows find their own efforts diminished by the flood of pink or blue, lace or denim, doll or ball gifts from well-intentioned friends and family.

Although gender neutral names such as Dakota, Peyton and Riley are more common than before, gender specific names continue to fill the top ten most popular baby names lists according to the Social Security Administration.

Table 1

2009 MOST POPULAR BABY NAMES

<table>
<thead>
<tr>
<th>Boys</th>
<th>Girls</th>
</tr>
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<tbody>
<tr>
<td>Jacob</td>
<td>Isabella</td>
</tr>
<tr>
<td>Ethan</td>
<td>Emma</td>
</tr>
<tr>
<td>Michael</td>
<td>Olivia</td>
</tr>
<tr>
<td>Alexander</td>
<td>Sophia</td>
</tr>
<tr>
<td>William</td>
<td>Ava</td>
</tr>
<tr>
<td>Joshua</td>
<td>Emily</td>
</tr>
<tr>
<td>Daniel</td>
<td>Madison</td>
</tr>
<tr>
<td>Jayden</td>
<td>Abigail</td>
</tr>
<tr>
<td>Noah</td>
<td>Chloe</td>
</tr>
<tr>
<td>Anthony</td>
<td>Mia</td>
</tr>
</tbody>
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As educators, it is appropriate to ask ourselves what we do to create and promote gender differences. Are we merely a reflection of existing “natural” gender differences? How overt are we in these creations or reflections? Do we still talk about *male doctors* and *female nurses* or merely suppress a sigh during roll call when we have three Ashtons and four Jordans and wonder if we should look for a boy or girl?

As teachers, we can hardly expect to have the influence of Hollywood filmmakers or New York publishers, but while we do not make the movies or write the children’s books, we have an enormous amount of influence over which artifacts we showcase in our classrooms.

In response to changing social and cultural norms regarding gender roles, authors and publishers have made concerted efforts to address the issue of gender-stereotypical activities and occupations – and to effectively neutralize them – so that children do not as readily associate certain activities and occupations with a specific gender, which risks the exclusion of the opposite gender. When certain activities and occupations become overly associated with one gender, a person of the opposite gender who participates in the activity or is employed in that occupation risks being targeted for confrontation and abuse (often in the form of “teasing”). This possibility can deter those who would otherwise enjoy and positively contribute to society to decide that the reward of engaging in non-stereotypical activities is not worth the risk.

For example, females have been portrayed for centuries as sitting demurely by while males take the active roles in sports, politics, war, and
occupations. Even though women “run” households and “rear” children, they are often portrayed, especially in illustrations, in non-active roles such as sitting or standing. Women were not allowed to participate in the first modern Olympics, 1896, although one poor Greek housewife was an unofficial competitor. Banned from competing in the race, she ran by herself the next day completing the final lap outside the city as she was not allowed to enter the stadium. Officials could not even remember her name, so they called her “Melpomene” after the Greek muse of Tragedy. Slowly, women were allowed to enter limited and specific Olympic sports; many of which were only exhibition games to begin with. However, it was not until 1981, almost a century after the resurrection of the Olympic games, that a woman became a member of the International Olympic Committee (Daniels and Tedder).

While stereotypes are most commonly associated with minority groups, they exist for all. For example, if a certain activity is seen as “girly” or “soft” then the assumption is boys should not participate. This creates a stereotype for boys, sending them the message that they are supposed to be “tough” and participate in only “manly” activities and look for “masculine” jobs.

Although efforts have been made for centuries to eradicate the gender-bias of language, the most recent movement was launched in the 1970s. Though many believe that this movement was due solely to feminists, in reality social reformers, parents and educators across socio-economic, education and religious backgrounds also participated in efforts to create standards for gender-fair language and nullify gender-based stereotypes. Over the last thirty years,
considerable research has been conducted in relation to publication protocols, education policies and even advertising practices, with the goal of understanding and assessing the ways we view activities and occupations related to social pressure and decisions about which genders should and do participate in particular activities. But has it made a difference in our children? Have these progressive efforts to include more female protagonists in children’s books, to require gender-fair language in publications, and to show more girls playing with “boy” toys made a change in the ways that children assign genders to various activities and occupations? Apparently not, according to Francis’s (2010) analysis of three-to-five-year-olds’ favorite toys and viewing material and their educational value. Results reveal that preferences are highly gendered and that boys’ resources concentrate on technology and action while girls’ focus on “care and stereotypically feminine interests” (Francis 325).

DEFINITION OF GENDERED LANGUAGE

Grammatical gender refers to a system of classifying words by gender categories. While most languages have three categories of grammatical gender – masculine, feminine, or neuter – some languages have more intricate classifications. For example, many Native American and African languages also assign grammatical gender based on animate and inanimate states. Some languages have classifications based on the physical shape of various objects while others become so complex that they contain over ten noun classes. Notoriously, Dyirbal, an Australian Aboriginal language contains one gender category for “women, fire, and dangerous things,” a phrase which linguist George
Lakoff borrowed for the title of his book Women, Fire, and Dangerous Things: What Categories Reveal about the Human Mind. Although English was originally a gendered language, over the centuries, efforts both institutionalized and unintended have molded English into a mostly non-gendered language. For example, English speakers view the noun *cat* as either masculine or feminine – often based on personal experiences with their own pet(s) - while Spanish speakers know *gato* to be a masculine noun. The category of English grammar that remains gender specific is our class of pronouns.

**THE ENGLISH PRONOUN SYSTEM**

English has a pronoun system categorizing 1st, 2nd and 3rd person pronouns. First person pronouns refer to the speaker (*I, me, mine, we, us, our, ours*) while second person pronouns refer to the audience (*you, your, yours*) and third person pronouns refer to the object of discussion (*he, his, him, she, her, hers, their, theirs, it, its*). While some pronouns are not gender obvious, for example *I* can be used by both male and female speakers, others are gender specific in that *he, his* and *him* refer only to males while *she, her*, and *hers* refer only to females. Another non-specifically gendered pronoun is *it*. While *it* is intended for inanimate objects, the pronoun is often used to refer to objects of indeterminate gender – objects that have a gender, but the gender is not obvious, as with some animals.

**STATEMENT OF THE PROBLEM**

An underlying assumption of this dissertation is that the feminist movement of the 1970s inspired educators, along with authors, illustrators, and
publishers, to be more conscious of the fact that children were being taught to conform to strict male or female role-divisions that might not be good for individuals or for society-at-large. As shown in the review of the literature, many factors contribute to the way that children develop their ideas about matters connected to gender.

No one wants to make school materials genderless because gender is an enormous part of every person’s identity as well as their interaction with others. What people who have given the problem serious consideration want is to recognize and question unintentional lessons in gender—those that accidentally creep into school materials because of the nature of the English language.

Communication problems are caused by the fact that English does not have a third-person singular pronoun that can refer to either males or females as do such first-person pronouns as I, me, us, and we, and such second person pronouns as you and yours. Speakers will sometimes use the pronoun it, but it connotes that something is nonliving or is in the category of “nonhuman.” For example, expectant mothers avoid referring to a fetus as it because they are acutely aware that the fetus is a living entity. Parents often dress their babies in culturally posited colors, such as pink or blue, to advertise their baby’s gender when his or her features are not developed enough to announce gender on their own. In another example, most pet owners refer to their pets as he or she, except when they are annoyed by their pet.

Knowledgeable and well-meaning adults try to solve the problem of the missing pronoun by using such phrases as she or he or he/she; even, in some
desperate cases, as s/he. However, this gets tiresome if used more than a couple of times in a brief communication, and rather than downplaying the matter of gender, this usage brings gender vividly to the attention of listeners or readers. The most common solution is to simply use the plural their even though what is being referred to is grammatically singular (Nilsen).

**ORGANIZATION**

We will look first at questions to be answered with a brief history of the gendering of children’s literature and explore how children’s literature functions as (1) a tool for influencing attitudes toward gender and (2) a mirror that reflects historical and current attitudes toward gender. The second half of the review of literature will examine the so-called generic pronoun and the problems associated with not having a third-person gender neutral pronoun in the English language.

Chapter Three will describe the methodology used in this study, including a description of the sample.

Chapter Four examines the findings. This chapter, as with the Review of Literature in Chapter Two, will be divided into two parts: findings relating to children’s literature and findings relating to children’s use of pronouns regarding stereotypical activities and occupations.

Chapter Five will conclude the research and posit areas for further examination.
RESEARCH QUESTIONS

Driving questions for this research included:

- To what extent has children’s literature, as represented by the Caldecott winners and runners-up for the last thirty years, influenced and/or reflected changes in culturally constructed, sex-appropriate activities and occupations?
- What pronouns will children use to describe various illustrations of animals used in children’s picture books?
- When presented with questions regarding a variety of activities and occupations, which pronouns will children assign to those involved in the activities and occupations?
- Will girls tend to use more feminine pronouns while boys use more masculine pronouns?
- Will there be noticeable differences in the pronouns chosen by first graders as compared to fifth graders?
- Will there be other obvious differences between the communication styles of boys and girls?
- Will there be evidence that Spanish speaking children’s pronoun decisions are affected by the fact that Spanish is a gendered language compared to English which has natural gender?
CHAPTER TWO

REVIEW OF LITERATURE

Schemas, from the Greek *schêma* meaning “form,” are underlying organizational patterns or structures. These conceptual frameworks allow a person to categorize various elements of his or her world. People use schemas to understand, make sense of, remember, and utilize the millions of pieces of information that they come into contact with on a daily basis. Educators have long understood the value of accessing a student’s prior knowledge before introducing new concepts or material. By first triggering prior knowledge stored in a similar schema, a person is better able to recognize and remember the new information. Each person has an unlimited number of personal schemas by which they order and comprehend the world.

If schema theorists are correct about the way children categorize elements of their world (Fagot and Leinbach; Martin and Halverson; Bem), then gender stereotypes begin at birth and have years of reinforcement before children enter the classroom. Gender schemas have three functions, the first being the regulation of behavior. This is seen in children’s choice of toys which conform to gendered roles (i.e. boys play with trucks and girls play with dolls). The second function is used in organizing and prioritizing information. Children display better recall regarding information that is consistent with their own bodies and the stereotypes they believe in. Third, gender schemas “are used as guides in making inferences about our social worlds, particularly when information is vague or incomplete” (Martin 190). If retention is aided by stereotypes, and gender stereotype
knowledge increases with age (Kuhn, Nash and Brucken), it can be tempting for educators to reinforce stereotypes by utilizing children’s gender labeling skills to aid in comprehension. One strategy is to find ways to introduce non-stereotyped information to children to help build their schemas.

Cognitive theorists state that “both behavior and thinking are influenced by knowledge structures” (Martin 186). If correct, Huston (1985) argues, knowledge should precede gender-related behavior and be correlated with gender-related thinking. Therefore, presenting gender with non-stereotypic methods and materials can help students as young as three (Kuhn, Nash and Brucken) in forming non-stereotypical views of activities and occupations (Conkright, Flannagan and Dykes). Based on these early findings, overt and systemic changes to gender and language have been made in the last thirty years in an effort to diminish the gender divide.

According to Fiske, Xu and Cuddy, female stereotypes involve traits which value warmth but not domination. Likewise, Cralley and Ruscher’s research names the following expected traits in females: dependency, non-competitiveness, submissiveness, intuitiveness and the possession of a higher moral and aesthetic sense. When females vary from these expectations, feelings of apprehension and concern can result (Forster, Higgins and Werth).

Powlishta (1995) had 167 children (ages eight-ten) complete a questionnaire in which they rated forty-eight personality traits. Half of the children rated the traits on a positive/negative scale and the other half rated the same traits on a masculine/feminine scale. Both boys and girls rated the traits
crude, loud, and fights as highly masculine and the traits shy, steady, dependent, and sorry for self as highly feminine. The children also agreed, although to lesser degrees, that messy, daring, strong, and cruel were also masculine traits while affectionate, gentle, weak, and cries were feminine traits. Talkative, stuck-up, distrustful, dominant, ambitious, and excitable, were all rated as highly gender-neutral traits by both boys and girls.

HISTORY OF GENDERED ENGLISH

Examples of the generic he can be seen as early as Old English. The trend continued through Middle English, where writers were content to use combinations of generic he to include both genders “he or she.” (Curzan 59) In 1850, the British Parliament passed a law stating that the generic he would be used in all legal documents. The reasoning was to save wording space. However, by 1850, English had spread most notably to America where, seventy-four years before, the Colonials had decided they would no longer follow Parliament’s laws. This did not, unfortunately, keep them from promoting the generic he.

Ironically, 1850s America was a time of distinct gender role separation – particularly in the South where belles and gentlemen each served society’s roles with startling diligence and a conformity that boarded on doctrinal. In ten years, however, war would destroy this balance – as all wars do – as the gentlemen became soldiers and the belles were forced to become farmers, industry employees, and nurses. Nursing, which was an occupation believed to be unfit for “proper” young ladies in the best of times, became a terrible necessity in a time of gruesome amputations.
Whenever society experiences a great upheaval, language changes quickly as words are added and meanings adapted in attempts to better describe the immense societal changes. Whether political revolutionaries are reworking words to express the ideals of freedom, or industrial revolutionaries are coining new words to describe the progress of technology, a living language moves, evolves and reincarnates according to the needs and whims of those who utilize it.

Language changes, but it does not always keep up as shown by the “pronoun problem.” Though attempted solutions have been around since, at least, the 9th century (according to Curzan’s delineation of OE as 850-950) (61, 70) we still struggle with which pronoun to use as anaphoric to a non-gender specific noun. According to Balhorn, writers have used the epicene they for centuries as a way of dealing with this problem. He cites Blake’s 1980 translation of *Canterbury Tales* to show that Chaucer also used “some form of they to corefer with every or each…therefore, they with plural generics was already well established in Chaucer’s language” (Balhorn 89-90). However, this created another problem.

Teachers view themselves as the guardians of language (Pauwels and Winter), a characteristic which may seem at odds with that of progressive educators who view themselves as the inspirers of future generations. However, it is teachers, working daily in the trenches, who have provided the best opportunities for inclusive language advancements. Although stereotypes increase with age, so does the tendency to be supportive of inclusive language (Parks and Roberton). Possibly because with “increasing age, children learn
about an increasing number of exceptions to stereotyped gender roles” (Conkright, Flannagan and Dykes 483). Additionally, the study performed by Parks and Roberton show that during the college years there is a link between lessening prejudice against women and increasing receptiveness to inclusive language.

Many believe that the efforts to eradicate sexism from the English language are undertaken solely by feminists (Graglia) who have “pronoun envy” a term used by some (such as the head of the Linguistics department at Harvard in 1971 as cited in Romaine 105-106) to dismiss the issue and others (most notably Anna Livia in her book Pronoun Envy: Literary Uses of Linguistic Gender) to proudly support the idea of it being a feminist concern in the greater concept of social reform for gender equality. However, the reasons for advocating inclusive language – that masculine-based language does not reflect social reality (Carter), that it builds unequal power relationships (Shaw and Hoeber), and that it can lead to ambiguity (American Heritage Book of English Usage, 1996) – are as varied as those who support the movement: parents, teachers, and social reformers of both genders.

ATTEMPTS AT A SOLUTION

Although English already has a precedent for a pronoun to be acceptable as both single and plural – as evidenced by the second-person pronouns you, your, and yours – resistance is strong to the acceptance of a singular use for they, their and theirs (Nilsen, 2001). Style guides and writing textbooks offer various ways of dealing with this pronoun problem including avoiding the issue altogether by
painsstakingly reworking sentences – which can result in convoluted English and loss of meaning. Most of these guides have a section on “fair language” and caution the writer to avoid the outdated practice of using the “generic he.” However, they are even more adamant about maintaining singular agreement – often at the expense of sex-indeterminacy (Balhorn 80). Though many people use the epicene *they* in spoken language (Matossian, Newman), and research by Pauwels and Winter show that teachers’ attitudes to students’ use of a singular *they* shows a 62% approval rating, other research done by Madson and Hessling on readers’ perceptions to various alternatives to the generic *he*, show that readers thought that using the epicene *they* resulted in the “lowest in overall quality” when reading textual passages.

Additionally, Sanford and Rilik state that although “(e)arlier researchers (Foertsch & Gernsbacher, 1997) found that with the neutral, apparently genderless, antecedents like *someone*, or a *runner* subsequent clauses referring to that individual by *he* or *she* or *they*, revealed a reliable disadvantage in the case of using *they,*” (176). Their experiment, which increased the sensitivity of the design and allowed more subtle measurement, showed that when a reader encounters a plural pronoun (*they, them*) “a search is initiated for a plural antecedent in the mental representation of the discourse and not for one that could be either plural or singular” (177). This resulted in “longer first-pass reading times for singulars than plurals, regardless of whether the condition was match or mismatch. This was followed by an earlier response to a mismatch in the singular case” (177). Concern exists, therefore, that use of the plural pronoun *they* in
reference to a singular antecedent negatively affects fluency and comprehension in readers of all stages.

As fluency and comprehension are two main foci for current literacy research and practice, reading material introduced into the classroom must be analyzed critically for both apparent and hidden curriculum. Especially in the early primary years, this material is gleaned greatly from picture books, and many of those choices come directly from the Caldecott list. Therefore, it is essential that teachers be aware of what gender-related messages, both from text and illustrations, are being portrayed in the books they use in their classrooms.

Studies regarding gender portrayal in children’s books have consistently reported a disparity of female characters especially in gender neutral or stereotypically masculine roles. Early studies regarding thirty years (1940-1970) of Caldecott winners and awards books cited in Alleen Nilsen’s 1973 research study show a “ratio of 11 pictures of males for every one picture of a female.” When pictures of animals are included, the “ratio of male to female animals [as shown by the authors’ pronoun use] is 95:1” (Nilsen 33).

What has changed in the last forty years? Not as much as some would like. Because books often serve as a frequent interaction for young children (Turner-Bowker) the language and pictures in these books can be used to either encourage or eliminate stereotypes (Gooden and Gooden). Thus, children’s books are an ideal vehicle for communicating the societal changes regarding gender and stereotypes as well as acting as a measure of attitudinal change.
However, with all the research that exists regarding picture books’ influence on gender identity (Gooden and Gooden), the societal advances for women in non-traditional occupations and the fact that 50.7% of the United States’ population is female (US Census QuickFacts), it would stand to reason that half of the characters in children’s books would be female.

According to the Gooden and Gooden study (2001) of eighty-three picture books for young readers on the Notable Books for Children list (including 1464 illustrations), 19% of illustrations were of females vs. 23% of illustrations of males. As in the 1972 Weitzman study, the difference was even more pronounced when animals were added: 24% female and 31% male (Gooden and Gooden).

Five years later, Hamilton, Anderson, Broaddus, and Young reported that in a study of 200 books (consisting of Caldecott Medal winners and honor books for 1995-2001 and best-selling books which had not won Caldecott or Newbery awards) the ratio of male-to-female pictures was 1.5:1. More telling was that female characters “were more than three times more likely…to perform nurturing or caring behaviors” (Hamilton, Anderson and Broaddus 761).

These results lead to a deeper problem. Authors and illustrators are getting closer to the 50/50 mark of portrayed males to females, but what the characters are doing is still highly stereotyped. There may be one male and one female in the picture, but the male is headed off to have an adventure while the female fixes him a lunch, wishes him well, and patiently waits for his return; the numbers are equal, but the message is far from one of equality. If we move
beyond the pictures and look at the words, we again see the inequality of the situation.

An examination of thirty-eight Caldecott medal and honor books from the last decade (2000-2009) shows that in the titles alone, sixteen male characters were mentioned as compared to only five female characters. Nine of these characters were historical figures: William Carlos Williams, Henry Brown, Philippe Petit, Noah, Waterhouse Hawkins, Martin Luther King, Jr., baseball player Casey from the poem *Casey at the Bat*, Rosa Parks, and Harriet Tubman (who is compared to the Bible character Moses). Of the non-historical title characters, there are differences in gender portrayal. For example, *A Couple of Boys Have the Best Week Ever* (2008) stands in stark contrast to *When Sophie Gets Angry – Really, Really Angry* (2004).

A total pronoun count shows 997 gendered pronouns compared to 1337 non-gendered pronouns. Of the 997 gendered pronouns, 684 are masculine (i.e. *he, his, him*) and 313 are feminine (i.e. *she, her, hers*). This more than two-to-one ratio of masculine to feminine pronouns is underscored by the fact that female characters are still more likely to be portrayed in nurturing roles.

Aside from the two historical female figures and a handful of female main characters, women appeared briefly as the mothers of famous men, lecturing their sons and husbands, or allowing their vanity to make them victims of smooth-talking males. In *So You Want to Be President?* (2004), the only woman was a reporter who snatched John Quincy Adams’ clothes while he was skinny-dipping in the Potomac as a way of getting an exclusive interview. If a male had done
this, it would have been accepted as enterprising whereas this female is portrayed as sneaky.

Some feminists praise the book *Joseph Had a Little Overcoat* (1990) because the man, Joseph, sews, tends the farm, plays musical instruments, and writes a book; many of his skills are ones usually attributed to women. However, the only women in the book are in illustrations and, with the one exception of a woman dancing, simply stand around in the background. In *A Child’s Calendar* (2002), based on John Updike’s poems, males plant tomatoes, fly kites, water plants, eat ice cream, catch tadpoles, sell lemonade, and jump in piles of leaves. Mothers cut chrysanthemums and shop for, and hide, Christmas gifts. When the family visits the beach, the father and son splash in the waves while the mother, frowning, chases the un-diapered baby.

When *Sophie Gets Angry – Really, Really Angry* (2004), “She kicks. She screams. She wants to smash the world to smithereens. She roars a red, red roar. Sophie is a volcano ready to explode.” While some have praised this book for letting kids know that it is okay to get angry, a little girl throwing a fit to get what she wants, then storming out of the house and running away when she does not, is hardly a positive image. In *A Couple of Boys Have the Best Week Ever* (2008), the boys play happily with each other and their temporary guardians, Bill and Pam, after their mothers drop them off for the week. Bill likes penguins and introduces the boys to information and types of penguin play while Pam repeats she “prefers humans” and does not join in the fun until the very end.
The most non-stereotypical book was *Knuffle Bunny: A Cautionary Tale* (2004). Trixie is two and her best friend is Knuffle Bunny. When dad takes Trixie and Knuffle Bunny to the laundry – while mom stays home – Knuffle Bunny becomes lost. The search has both parents frantically retracing steps to find and return Knuffle Bunny to an upset Trixie. The portrayal shows Trixie more as a typical two-year-old than “girlie.” In *Knuffle Bunny Too: A Case of Mistaken Identity* (2007), Trixie heads to school and meets another girl with her own Knuffle Bunny. Sadly, the girls immediately argue about who has the “real” Knuffle Bunny, causing the teacher to take both bunnies away until the end of school. At bed time, it is discovered that each has the “false” Knuffle Bunny. Fathers make late-night phone calls and race across New York City to return each bunny to the correct girl. However, both girls are portrayed more as typical four-year-olds of either gender than over-emphasizing stereotypical feminine traits. The gender of either Knuffle Bunny is never revealed.

Picture books’ representation of gender roles is particularly reinforcing in that the books are often read and reread (ad infinitum) to children. Every parent who has ever read to his or her child knows what happens when said child finds a favorite book and needs it read every night, often until the book is memorized by both parent and child. This level of reinforcement, especially at such an impressionable stage of development, can have incalculable influence on a child. According to Oskamp, Kaufman and Wolterbeek (1996) “(c)hildren’s books provide their audience with cues about life—in particular, about what goals and social norms are available and appropriate for members of their sex” (27).
Oskamp, et al’s study added a dimension to previous studies by distinguishing adult from child characters. While agreement on which characteristics traditionally belonged to which gender varied amongst interraters; they averaged 80% for female characters and 77% for male characters. Another, newer, element noted that while the authors’ genders of these books (twenty-two Caldecott winners published in 1986-1991) was almost equal (ten females and twelve males) “the illustrators were predominately males, 17 to 5” (Oskamp, Kaufman and Wolterbeek 32). However, the amount of autonomy that illustrators have in which pictures are published was not reported.

Of the forty-two Caldecott winners and award books reviewed, thirty of them had male illustrators. Of these forty-two, nineteen books were illustrated and written by the same male. Of the twelve female authors who did not illustrate their own books, eight of them were illustrated by a male. One book had both a male and a female illustrator, but they were also the co-authors. There was only one book written by a male and illustrated by a female. Ironically, this book, A Child’s Calendar (2002) by John Updike and Trina Schart Hyman, has some of the most gender stereotyped pictures in all of these books: the girl fills the birdfeeder while the boy flies the kite; the men of the family sit at the table and wait while the women serve the Thanksgiving meal; the family visits the beach and while the father and son play in the water, the mother chases the baby. What stands out most in these various pictures is the total number of male to female pictures – thirty-nine portrayed males to only eighteen females – and the fact that the mother isn’t smiling in any of them. While it is easier to draw people in
passive, rather than active, situations, it is just as simple to draw a smile as a frown.

The most interesting examination in Oskamp, et al’s article was a direct comparison of gendered character traits in Williams, Vernon, Williams, and Malecha’s study (1987) and Oskamp’s study (1996). This comparison shows a decrease in the number of female characters who exhibit the traits of dependency, nurturing, and passivity, while increasing the traits of exploration, aggression, and persistence. The rate of employment remained the same in both studies, reporting a one-to-three female to male ratio of characters who held jobs.

Studies continue to look at gender stereotypes and children’s literature (Diekman and Murnen, Evans, Hamilton, et al, and Tsao). These studies all agree that sexism in children’s literature does matter and is still prevalent. While changes have been made over the years to equalize gender roles, Diekman and Murnen argue that these changes have been “predominantly asymmetric” (373). Advances have occurred in portraying female characters as more independent and adventurous but little change in the stereotypical roles of men have occurred. Therefore, either female characters are doing twice the work – being adventurous and nurturing – or traditionally female roles are being neglected or their importance minimized.

Researchers have studied the issue of children’s perceptions of gender roles from a variety of angles. In 1973, Bem and Bem studied high school seniors’ level of interest in various jobs advertised in help wanted advertisements based on the specific job titles. They showed that females were more interested in
jobs labeled with feminine suffixes (i.e. “lineman” at 5% interest vs. “linewoman” with 45% interest).

More recently, researchers have examined younger children’s views of gender and occupations. In a paper presented at the Biennial Meeting of the Society for Research in Child Development (1997), Davison reported on a survey given to classes of fourth and sixth graders who were asked to rate twenty-five professions as “male only,” “female only,” or “both.” Most telling, boys were more likely to choose “male only” for occupations than were girls. Additionally, older students (sixth graders) were more likely to select “both” than were younger students (fourth graders).

Other researchers have attempted to understand how television affects children’s perceptions of gender and occupation (Durkin and Nugent). Durkin and Nugent had their kindergarteners also rate their perceived level of future competence in particular activities and occupations, i.e. “Could you be a truck driver when you grew up, if you wanted to?” (Durkin and Nugent 394). Again, masculine activities tended to receive more stereotyped responses in regards to gender predictions, ability judgments and self-competence scores. While girls were more likely to state that a female was capable of success at a traditionally male occupation, they were less likely to state that they themselves would have that ability when grown.

Difficulties arise, however, in finding evidence of direct causality as it is difficult to single out any one influence and “prove” that it is the one responsible for a child’s perception (Durkin and Nugent). Additionally, as Davison reported,
in regards to particular sex ratios and occupations, the issue can be classified as a chicken-and-egg problem: are particular occupations seen as stereotypically gendered and thus few members of the opposite gender join that particular work force or is that occupation seen as gendered because the majority of the employees are of one gender (Davison)?

Finally, researchers have examined the role that parental occupation plays in children’s views of gender and occupation. Some suggest that the “mother’s educational level and employment history in particular, have significant impact on her children’s attitudes” (Davison 4). Others suggest paying particular attention to the matter by inviting parents with non-traditional careers to guest speak in classrooms as a supplement to children’s literature and to role playing non-stereotyped activities that expose children to a variety of careers (Trepanier-Street and Romatowski). Most recently, Sinno and Killen (2009), show that children of both genders view it as acceptable for both fathers and mothers to work outside of the home, but still find it less acceptable for fathers to be stay-at-home caregivers. Their findings support the last thirty years of research findings in two regards: 1) children are more flexible in their reasoning and use fewer stereotypes as they age; and 2) children’s perceptions are that it is more acceptable for women to participate in traditionally male activities and occupations than for men to participate in traditionally female activities and occupations.

In response to claims that children are unaware of gender roles and prestige which may be associated with specific occupations, Teig and Susskind (2008) conducted three experiments. The first examined the ratings made by 107
children (ages six to twelve) of status and gender roles regarding fifty-four occupations. Using these ratings, the next experiments had two groups of children (six-to-eight-year-olds and nine-to-twelve-year-olds) report their job preferences. Each of the five occupations used in my experiment which were seen as typically female, were also listed in the top half of Teig and Susskind’s rankings, with four of them being in the top thirteen roles. Correspondingly, five out of six jobs I used as typically masculine were in the top half of jobs ranked as masculine by Teig and Susskind with four listed in the top fifteen. Only author was seen as a neutral occupation by Teig and Susskind’s participants and it should be noted that they specifically asked their respondents to rank “children’s book author” as opposed to just “author.”

Although the occupations chosen for this current study were those used in Nilsen’s 1974 study, the results of Teig and Susskind’s research show a clear agreement that children still perceive a strong correlation of those jobs considered feminine, masculine and neutral to those labels from thirty-five years ago.

Teig and Susskind also looked at the levels of prestige that children associated with various occupations. Children in both age groups ranked masculine jobs as having higher prestige than feminine occupations. When asked to state an occupational preference, children of both genders were more likely to align with same-gender occupations although girls were more likely to show a willingness to prefer a masculine gendered job for the extra status it afforded. Boys, especially in the older age group (nine to twelve), were less likely to show a preference for feminine occupations. Whether this was because they didn’t want
to lose out on higher status occupations or because the consequences for gender role violations are stronger for males than females, as hypothesized in Fagot (2000), was not clear.

The studies’ results that younger children are more flexible regarding gender when considering occupational roles mirror those of the earlier work of Trepanier-Street and Romatowski (1999). This flexibility may be because during early childhood children are still constructing their gender and social identities. Their attitudes about the “boyness” or “girlness” of toys, books, clothes, activities and occupations are still developing. Therefore, they can still be influenced. Trepanier-Street and Romatowski decided to use children’s books to determine the possibility of influence.

Seventy-four children (thirty-four boys and forty girls in preschool through first grade) were given a pretest, with resulting data showing that the children saw many occupations as appropriate for both men and women. Those occupations which were described as either masculine or feminine followed traditional stereotypes. Students then listened to six children’s books (over a two-month period) which had been specifically chosen by researchers for their non-stereotypic gender activities and situations. Activities included creating lists of activities their mothers and fathers liked to do, children drawing pictures of themselves participating in various occupations, and guest speakers who discussed their careers and answered children’s questions.

Although the pretest data had a high level of occupations which children said were appropriate for both men and women, the posttest data showed an
increase in “for both” responses from both boys and girls. Although some people believe children are not affected by ideologies in books (Taylor), direct intervention of students with pre- and posttest data show otherwise.

Research also suggests that children follow stereotypes in choosing various activities in which to participate. Many researchers have examined children’s play based on same-sex and mixed-sex groups (i.e. all boy, all girl, or both). These researchers (such as Phillipsen, Deptula and Cohen; Kalpan and McCormack; Powlishta) focused on how children act as a unit – a composition of the group as a whole. Fabes, Martin and Hanish analyzed “the degree to which children’s behavior changed depending on whether they are playing with (a) a member (or members) of their own sex, (b) a member (or members) of the other sex, or (c) members of both sexes” (Fabes, Martin and Hanish 921). By examining children’s individual actions while they interact with others, researchers discovered that the individual entering other-sex groups would conform to a greater degree to that gender’s preferred method of play. For example, boys tended to play more aggressively, in larger groups, and farther away from adults. Girls preferred less aggressive play, smaller groups/dyads, and closer proximity to adults. Additionally, girls’ play was more likely to resemble adult activities (cooking, pretending to be families, care for children, etc…). Stereotypical activities were noted as more likely to happen in same-sex groups than mixed-sex groups.
CHAPTER THREE
DESCRIPTION OF THE SAMPLE AND METHODOLOGY

DESCRIPTION OF THE SAMPLE

In the last thirty-five years, such dynamic changes have been made toward achieving diversity and multi-culturalism in American education that it would be incredibly difficult to find an elementary school with a comparable student sample to a study conducted in 1973. However, instead of trying to avoid or downplay the differences in language and socio-economic status, I thought it best to take advantages of the opportunities that these differences afford, especially in Arizona. As the hope of this research was to compare findings with those from a study done thirty-five years ago to see what, if any, changes could be detected in “children’s spontaneous use and interpretation of gender” (Nilsen) the methodology in this study was as similar as possible to that of the original. However, the sample varied as the original study was performed on children (mostly white, middle-class children) who attended a university laboratory school in the mid-west. This current research was done at a school with a high population of ELL students to see what, if any, differences could be ascertained between primary English speakers (non-gendered language) and primary Spanish speakers (gendered language).

The current study was conducted at Frank Elementary School, Tempe Elementary School District 3, Guadalupe, Arizona. This school serves the town of Guadalupe and the Yaqui Native American tribal lands. Frank is a Pre-K through 5 school serving over 700 students. Ethnographic make-up is
approximately: 33% Hispanic; 33% Caucasian; 20% Native American; 11% African American; and 3% other.

FIGURE 1
FRANK ELEMENTARY SCHOOL STUDENT ETHNOGRAPHIC DISTRIBUTION

Frank Elementary was chosen as the site for data collection for several reasons:

1. The population of Hispanic and Native American students (Yaqui children speak primarily Spanish and English as opposed to the Yaqui native tongue) made possible the comparison of L_1 \textsuperscript{1} and L_2 \textsuperscript{2} students;

2. In compliance with the Arizona Department of Education ELL model, Frank has already designated students as L_1 and L_2; and

\textsuperscript{1} L_1 refers to native English speakers. \\
\textsuperscript{2} L_2 refers to native Spanish speakers.
3. Frank offers full-day Kindergarten classes at both the L1 and L2 designations making possible the collection of responses from participants as young as 5-years-old.

As with the original study, “the main research tool used to investigate children’s spontaneous use and interpretation of gender consisted of a three part interview” (Nilsen). Part 1 of the interview consisted of the student describing a series of pictures of animals; Part 2 of the interview consisted of the student choosing which animal was being described by another student; Part 3 of the interview consisted of the student adding answers to a series of tag questions regarding various activities and occupations.

The interviews with the children were conducted over a four-day period, May 11-14, 2009, in the Frank Elementary School library. A total of seventy-eight children ranging in grades kindergarten through fifth were interviewed. See Table 2 for grade and gender disbursement of subjects.

It is important to keep in mind that I had wanted one hundred children to participate in the study. My goal was to get ten boys and ten girls at each grade level. Of these, I wanted five of each gender to be native English speakers and five to be native Spanish speakers. I gained approval from one ELL designated class and one non-ELL class at each grade level and information letters and consent forms, in both English and Spanish, were sent home with every child in these twelve classes. As there were a minimum of twenty children in each class (a total possible participation pool of more than 240 students), there was the probability that I would be able to work with five girls and five boys from each
class. Unfortunately this was not the case. Only eighty-one children returned the permission form. The day before I began my interviews, two of these students were suspended for the remainder of the week, and one was out sick for the week. I interviewed all of the remaining seventy-eight students and this resulted in some subcategories having only one participant (i.e. one male student, or one ELL student), as can be seen by Table 2. After analyzing response data, it became evident that the sample size was not sufficient to draw trustworthy conclusions regarding L₁ and L₂ differences. Therefore, I have decided to report my findings in broader group ranges.

Table 2
PARTICIPANT GRADE AND GENDER DISBURSEMENT

<table>
<thead>
<tr>
<th></th>
<th>K</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
</tr>
</thead>
<tbody>
<tr>
<td>Male L₁</td>
<td>3</td>
<td>3</td>
<td>3</td>
<td>1</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>Female L₁</td>
<td>8</td>
<td>2</td>
<td>9</td>
<td>2</td>
<td>2</td>
<td>5</td>
</tr>
<tr>
<td>Male L₂</td>
<td>2</td>
<td>4</td>
<td>4</td>
<td>2</td>
<td>0</td>
<td>4</td>
</tr>
<tr>
<td>Female L₂</td>
<td>1</td>
<td>2</td>
<td>1</td>
<td>3</td>
<td>5</td>
<td>5</td>
</tr>
<tr>
<td>Total</td>
<td>14</td>
<td>11</td>
<td>17</td>
<td>8</td>
<td>10</td>
<td>18</td>
</tr>
</tbody>
</table>

As with the original study “the factors being tested in this study were age and sex in relation to use of gender…no attempt was made to analyze the children as to such things as IQ or reading level….And since the most important factor in the success of the study was to obtain a free-flowing and spontaneous sample of each child’s speech, every effort was made to keep the interviews informal and
game-like. Therefore no pre-planned list of children who would participate was made” (Nilsen).

METHODOLOGY REGARDING CHILDREN’S LITERATURE

On the designated day and time, I arrived at the classroom and collected the signed permission forms. The classroom teacher chose the first two participants and I walked these two students to the library. I allowed the students to choose who would be the “descerner” and who would be the “guesser.” The describer (Student A) sat in front of my laptop and the guesser (Student B) sat across the table from the describer unable to see the laptop screen. On the table in front of Student B were several color pictures of storybook animals. There were two pictures of each animal – one involved in an action (flying, running, swimming, etc…) and one of the same animal in a more sedentary pose (lying, sitting, standing, etc…). Student A was to look at the picture on the screen and describe the animal to Student B who held up the picture as he/she guessed which animal was being described. If Student B was correct, the picture was placed upside down on the table and Student A advanced the PowerPoint slides and described the next animal shown on the screen. This process continued until all of the slides had been described.

It is important to note that Student B had more pictures to choose from than were described. For example, if Student A had twelve animals to describe, there were eighteen pictures for Student B to choose from. This kept down the possibility that the last few animals described would not be given adequate
Descriptions by Student A before Student B guessed based on process of elimination instead of the description.

Once Student A finished describing all given pictures, Student B was sent back to the classroom and told to send the next student. This student was chosen based on the next permission form in the stack that the classroom teacher had given me. There was no order to the forms, and the next student was chosen completely at random. Thus, sometimes there were two boys giving and receiving descriptions and sometimes there were two girls. At other times, there was one girl and one boy partnered together. During this intervening time while Student B returned to the classroom and sent the next participant, Student A participated in Part B of the interview. I explained what tag questions were, gave the student examples and then read the list of activities and occupations, circling the student’s responses as to “he” or “she” (further described in Chapter 4). Student A then moved to the other side of the table and became Student B. The next student who arrived at the library, sat in front of the laptop and became Student A. For each grade, two PowerPoint presentations had been created so that Student B was not hearing the same animals in the same order as had previously been presented. This allowed Student A to have more time to describe the animals. This rotation continued until all students from that class had participated. At the end, the first Student B returned to be the “describer” and participate in part B of the interview.

I did not tell the students that the purpose of this exercise was to determine views on gender or pronoun usage. The children believed that they were playing
a game to see how quickly Student B could guess the correct animal (i.e. cognitive busyness). This allowed their conversation to be natural and spontaneous while I wrote down all of the pronouns used by the children.

Earlier, we noted that a barrier to studying children’s natural perceptions of gender is that the material used often has the gender inherent and apparent within the material. Therefore, data is scarce regarding children’s subconscious, and most honest, understandings and beliefs regarding gender stereotypes. Perhaps this neglect is simply because it is difficult to set up such a study. Most pictures of people will be obvious as to the gender as will most personified animals depicted in human clothes. Thus, this study used pictures of animals taken from a variety of children’s books specifically chosen to depict the animals in the most natural ways. Care was taken to not choose pictures of animals where gender was obvious or inherent. For example, although all cattle (male and female) are born with horns, the practice of removing the horns from female cattle creates a situation where most children (especially those raised in an urban environment) will identify any bovine with horns as a male. Pictures of roosters or chickens were not used as the animals’ gender is obvious. Additionally, as in the original study, popular characters such as Angelina Ballerina (a mouse), by Katharine Holabird, Skippyjon Jones (a cat who thinks he is a Chihuahua) by Judy Schachner and Edward Tulane (a rabbit) by Kate DiCamillo were not used as they were perhaps so familiar to the children that they would approach the pictures with preconceived ideas of each animal’s gender.
To determine whether there would be a difference in pronoun assignments between native English speakers and Spanish language speakers, animals were chosen which have grammatical gender in Spanish. Six of these – bee, butterfly, giraffe, owl, snake, and turtle – have feminine gender, seven have masculine gender – cat, dog, elephant, mouse, pig, rabbit, and tiger – and one can be either masculine or feminine – bear. The pictures in this study were of a tiger from Heart of a Tiger (Arnold), a turtle from Turtle in the Sea (Arnosky), a mouse from The Mouse Who Braved Bedtime (Baum), a dog and a cat from Cat Skidoo (Roberts), a pig from The Day Jimmy’s Boa Ate the Wash (Noble), an owl from What did you do today? (Arquette), a butterfly and a bee from For Everyone to Share (Lobel), a snake from The Snake Who Was Afraid of People (Polisar), a giraffe from The Giraffe Who was afraid of Heights (Ufer), an elephant from Little Elephant’s Trunk (Lincoln), a bear from Bedtime for Button (Stewart), a kangaroo from Yes We Can! (McBratney), and a rabbit from When We’re Together (Freedman).

METHODOLOGY REGARDING TAG QUESTIONS

In 1973, Alleen Pace Nilsen conducted a two-part research project on a group of 100 students at the Malcolm Price Laboratory School, University of Northern Iowa, Cedar Falls, Iowa, to see if a relationship existed between participants’ sex and their perception of certain activities or characteristics. The purpose of her research was “to find if there would be agreement among the children as to which characteristics were feminine and which were masculine” (Nilsen 140). The research questions included:
• Would the degree of agreement be related to age or sex of the children?
• Would the children’s interpretations match the stereotypes of boy and girl characteristics given in school materials?
• And in talking about children with neutral characteristics would girls tend to use feminine pronouns while boys would tend to use masculine pronouns?

The second part of the research focused on the relationship between participants’ gender and their perceptions of adult occupations. The purpose was to see if there existed a stereotypical link, in the perceptions of these children, between certain occupations and gender, and how the children’s responses correlated to or contrasted with representative data (as defined by current United States labor statistics). The research questions for this focus included:

• Whether or not some of the occupational terms were carriers of opaque gender in that they automatically triggered children to think exclusively of males or exclusively of females?
• How close would the children’s percentages of feminine answers come to the actual percentages of female workers in the particular occupational fields?
• And how would the children’s views change as they got older?

The researcher asked the children “two sets of statements (one about children and one about adults) which were designed so that tag questions could be added at the end of each statement. They contained no direct or transparent
markers of gender, but the nature of a tag question is such that when it is added to a sentence a decision must be made as to the gender appropriate to the subject of the sentence. For example, when a tag question is added to the sentence, ‘Our neighbor was here,’ the result is either ‘Our neighbor was here, wasn’t he?’ or ‘Our neighbor was here, wasn’t she’” (145). In an effort to keep my research parameters as similar to the originals as possible, I gave my participants the same instructions as those given in 1973:

We are going to do an exercise where I will make a statement and then you will complete it by adding a tag question. For example, if I say, “The lady was drinking pop,” then you say, “wasn’t she?” If I say, “The man was tall,” then you say, “wasn’t he?” Okay, now let’s try it just for practice.

“The boy was riding a bike…”

(This was said with rising inflection and a pause giving the child time to respond with, “wasn’t he?” Help was given where needed.)

“Good. Now we’ll try another one. ‘The girl was swimming.’”

(Again, there was a pause for the child’s responses.)

“Fine! Now that you’ve got it, we’ll do the real thing. The first sentences are about grown-ups and then we’ll do some about children.”

The sentences were read and responses recorded.

In an effort to see where, or even if, children’s views of certain occupations being “male” or “female” had changed over the last thirty years the instrument employed was the same as in the 1973 study and given to the

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3 Due to the cultural nature of Frank students, the word “pop” was changed to “water.”
population described earlier of seventy-eight children at Frank Elementary in Guadalupe, Arizona. It was the second part of their individual interviews coming after the matching up of the pictures of animals. This part was saved until after the student had described the animal pictures. If it had been done first, there was a chance that the student would figure out what the purpose of the descriptions was and, thus, taint the subconscious choice of pronouns used for the animals.

As in the previous study, students were given the directions as described earlier. The sentences were then read to the students and their responses recorded on the back of the page that had been used to record their pronoun choice for the first part of the interview. Most of the students caught on quickly though for many of the younger ones (Kindergarten and a few first graders) the interviewer found it necessary to lead with “…wasn’t” and wait for the student to supply the pronoun.

In the original study, all the sentences were chosen specifically to be singular and in the past tense “to make it as easy as possible for even the youngest children to understand the system of tag questions” (Nilsen 147). The sentences relating to children all began with the “The child was…” so that the focus of attention was on the activity. Regarding the sentences about adults, an attempt was made by the original researcher “to keep the activities listed in conjunction with the occupational title neutral in appeal and simply a part of the job rather than “an expression of such value judgments as ‘…was stupid,’ or ‘…was grouchy.’ This was to keep the focus on the occupational roles rather than on personality characteristics” (Nilsen 148). For the original study, the researcher
designed the twelve questions to test for a variety of responses. Her prediction was that *crying, baby sitting, very pretty,* and *sitting by the swings* would be more likely to elicit feminine pronouns. The phrases predicted to elicit masculine pronouns were: *tough, fighting, winning the race,* and *building a robot.* Gender neutral activities and characteristics that were predicted to elicit an equal mix, perhaps depending on the gender of the child, were: *wearing new shoes, talking, watching TV,* and *eating lunch.* These designations are noted in parentheses after each sentence.

After the directions and practice sentences, the statements were read in the following order:

**TABLE 3**

**CHILDREN’S ACTIVITY QUESTIONS**

<p>| | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>1.</td>
<td>The child was wearing new shoes, ... (N)</td>
<td>he  she</td>
</tr>
<tr>
<td>2.</td>
<td>The child was talking, ... (N)</td>
<td>he  she</td>
</tr>
<tr>
<td>3.</td>
<td>The child was watching TV, ... (N)</td>
<td>he  she</td>
</tr>
<tr>
<td>4.</td>
<td>The child was sitting by the swings, ... (F)</td>
<td>he  she</td>
</tr>
<tr>
<td>5.</td>
<td>The child was eating lunch, ... (N)</td>
<td>he  she</td>
</tr>
<tr>
<td>6.</td>
<td>The child was tough, ... (M)</td>
<td>he  she</td>
</tr>
<tr>
<td>7.</td>
<td>The child was winning the race, ... (M)</td>
<td>he  she</td>
</tr>
<tr>
<td>8.</td>
<td>The child was crying, ... (F)</td>
<td>he  she</td>
</tr>
<tr>
<td>9.</td>
<td>The child was fighting, ... (M)</td>
<td>he  she</td>
</tr>
<tr>
<td>10.</td>
<td>The child was baby-sitting, ... (F)</td>
<td>he  she</td>
</tr>
<tr>
<td>11.</td>
<td>The child was very pretty, ... (F)</td>
<td>he  she</td>
</tr>
<tr>
<td>12.</td>
<td>The child was building a robot, ... (M)</td>
<td>he  she</td>
</tr>
</tbody>
</table>

**SENTENCES ABOUT ADULTS**

The second set of tag questions given to the students focused on adult occupations. As when choosing characteristics, Nilsen based her choices for occupations on finding an equal number of perceived masculine occupations:
boss, doctor, author, truck driver, plumber, and farmer; and perceived feminine occupations: nurse, teacher, dancer, secretary, cook, and clerk. These sentences were read to students, and their endings recorded as described earlier in this chapter.

**TABLE 4**

**ADULT OCCUPATIONAL QUESTIONS**

1. The nurse was in the other room, … he  she
2. The teacher was absent, … he  she
3. The dancer was spinning around, … he  she
4. The secretary was typing, … he  she
5. The cook was peeling potatoes, … he  she
6. The clerk was adding up the prices, … he  she
7. The author was writing a book, … he  she
8. The doctor was here, … he  she
9. The plumber was fixing the sink, … he  she
10. The farmer was tired, … he  she
11. The truck driver was careful, … he  she
12. The boss was on the phone, … he  she
CHAPTER 4

FINDINGS

Most studies attempting to understand how children perceive gender have an included bias. In describing the research procedure, the participants are told that the study has something to do with gender; thus, they are on the alert. Additionally, most gender studies have participants describe pictures of humans. Therefore, with extremely few exceptions, the participant does not have to assign a gender to the subject of the picture. Rather, they merely describe what is given to them. This makes it difficult to accurately determine how children subconsciously perceive gender and what effect this has on developing, reinforcing, or negating perceived stereotypes.

Research into the gender perceptions of children focuses mainly on experiments where the children are aware of characters’ gender. Many experiments focus on readers’ comprehension of stories where the protagonist is the same gender vs. opposite gender of the reader (Conkright, Flannagan and Dykes). Few experiments have been done where the students have the responsibility of determining the gender of the character. Is there a natural, even subconscious process in the way children think about gender? If so, is there a way that researchers can examine these subconscious processes?

Even young children have an idea that there is a “correct,” or at least “politically correct,” response to certain questions. They know that girls can be doctors or plumbers and are aware to some extent that they are supposed to respond in this way. After all the effort and money spent in advertising,
publishing, and educating successive generations to think of gender in terms of equality, how is a researcher to know if children are giving an honest response or merely responding with the answer they believe they are supposed to give?

Various literature suggests the necessity of “cognitive busyness” (Cralley and Ruscher) – being cognitively focused on other tasks so that the subject’s responses are more subconscious and less thought-out – to gather the most honest answers regarding the subject’s views on gender. While cognitively busy with a concurrent task, respondents “lack the necessary capacity to exert the effort needed to avoid discriminatory behavior” (Cralley and Ruscher 303). Therefore, in order to determine what the respondent’s actual views are regarding various activities and occupations, and which gender these activities and occupations belong to (stereotyping), it is necessary to design an experiment in which the subjects concentrate on a concurrent task and are unaware that the true intent of the researcher is to gather information regarding subjects’ gender views.

The experiment designed in 1973 by Alleen Nilsen and partially replicated here, is done with the intent of creating a situation where children are responding quickly and naturally so that the researchers can better hope to gain an accurate understanding of children’s perceptions of the relationship between sex and children’s activities and adult occupations (Cralley and Ruscher).
FINDINGS REGARDING PRONOUN USE IN RELATION TO CHILDREN’S PICTURE BOOKS

Every pronoun used by the children in both of the activities described earlier was recorded. The seventy-eight students used 2173 total pronouns to describe the thirty pictures (two pictures for each animal, representing both an active and sedentary role). The forty-five female students used a total of 1376 pronouns while the thirty-three male students used a total of 797 pronouns. While the average use was almost twenty-nine pronouns per child, the range of actual use was much greater. One kindergarten ELL student used no pronouns at all by beginning each of her statements with “This animal.” Additionally, two male fourth grade students also began each statement with “This animal” but then switched to pronouns within the sentence. For example, “This animal is flapping its wings” (describing the picture of the flying owl).

The most pronouns (102) were given by a fourth grade female student (seventy-six neutral and twenty-six masculine). The second highest number (sixty-three) was given by a first grade female student (sixty neutral and three masculine). That the girls used more pronouns than did the boys relates to an unanticipated difference in how the boys and the girls approached the activity. When a girl was guessing which animal was being described, she would wait until the person giving the description paused before offering a guess. In contrast, when the boys were guessing, they tended toward offering guesses as soon as they had one; they guessed more quickly and more often, making great leaps on few clues. Girls took more time, studying the pictures more closely and waiting for
more clues so as to be certain of their guess. This combination allowed the student describing to a female “guesser” to have more time to speak.

Another interesting aspect was that the girls, when giving the descriptions, tended to talk in more complete sentences while the boys would just state key words. For example, when describing the butterfly, a girl would say “It has purple wings with blue spots on them,” while a boy would often say “It’s blue.”

ANALYSIS OF FEMININE PRONOUNS GIVEN

Of the total 2173 pronouns, 335 were masculine, thirteen feminine and 1825 neutral. Most students (forty-six) switched between gendered and neutral pronouns. The thirty-two remaining students were consistent with using only one pronoun in all of their descriptions. However, of those thirty-two, only two (a first grade male and a fifth grade male) used only masculine pronouns. The remaining thirty students used only neutral pronouns. No student used only feminine pronouns.

Of the thirteen feminine pronouns given by students, only the following animals were given any feminine pronouns: turtle (five pronouns), butterfly (two pronouns), and cat (six pronouns). In Spanish, turtle and butterfly are feminine nouns but cat is a masculine noun. It was anticipated that native Spanish speaking students would use more gendered pronouns, and that these pronouns would align with the gender assigned to each animal in the Spanish language. However, this was not the case. Possible reasons for this will be discussed further in the next chapter.
Although feminine pronoun choice was distributed across the grade levels (Kindergarteners, second and fifth graders used feminine pronouns), the largest use was by the two youngest (both male) students. As the student population got older, fewer feminine pronouns were used and in each of these cases, other pronouns were used in the description of the animal. In one case, the fifth grade girl describing the cat used “it” three times before saying “she.” The student quickly corrected herself by saying “I mean it” and then used “it” five more times in the description. In the other fifth grade female student’s case, in describing the butterfly, she used “it” three times, “he” three times and “she” once. Her other pronoun choices – to describe the other animals – were distributed as twenty-three neutral and eighteen masculine.

The male kindergarten student used “she” five times to describe the turtle. In this student’s case, the turtle was the first animal he was given to describe. He then used masculine pronouns to describe the mouse, elephant and dog and then switched to a combination of masculine and neutral to describe the rabbit. Next he used all neutral pronouns to describe the butterfly and giraffe before ending with mixed neutral and masculine pronouns to describe the cat. This suggests that there were other, indeterminate, factors regarding this student’s pronoun choice.

The second grade male student, who used a total of four feminine pronouns, also used a combination of masculine and neutral pronouns. However, in contrast to the kindergarten student, this student was consistent with his pronouns. For example, all pronouns used for snake and giraffe were neutral while all pronouns used for dog, bee, bear, elephant, owl, mouse, tiger and turtle
were masculine. All pronouns for cat were feminine - he used “she” three times. The only instance where the student mixed pronouns for the same animals was when he described the butterfly. He began with the statement “She’s pretty” and then used “it” three times to describe the animal (i.e. “It flies”). Although the student was an English Language Learner, the choices for pronouns do not all align with Spanish gender. For example, he used masculine pronouns to describe the bee, owl and turtle - all feminine gender nouns in Spanish.

The animal which received the most feminine pronouns (six total) was the cat. Additionally, the most students who assigned a feminine pronoun to any animal were for the cat (four total). However, the “cat” also received twenty-six masculine pronouns and 147 neutral pronouns.

In contrast, the animal which received the most number of gendered pronouns (sixty-two) was the dog. All sixty-two of these gendered pronouns were masculine. The distribution of students assigning masculine gender to the dog shows a close ratio of males and females (ten-to-twelve), and a grade distribution which includes every grade included in the research. This inclusivity indicates that some factor other than gender or age influenced students’ pronoun choice.

As the two animals which received the most gendered pronouns are also the two animals students are most likely to have personal experience with (i.e. domesticated pets), it is possible that this factor – more than gender, age, or language acquisition – plays a role in pronoun assignment. Further research is necessary to assess the potential of this hypothesis.
SUMMARY AND CONCLUSIONS REGARDING PRONOUN USE IN RELATION TO CHILDREN’S PICTURE BOOKS

Indications show that native language does not make as much of an impact on gendered pronoun assignment as originally predicted. Instead, personal experience, regardless of language, might be an influence. Domesticated animals were assigned gendered pronouns at an extremely exaggerated rate over non-domesticated animals. It is likely that many of these students currently, or previously, owned a cat or dog, or possibly even a turtle. Perhaps their pet’s gender influenced their pronoun use. Perhaps, even though animal characters from popular children’s books were not used in the study they, nevertheless, influenced children’s pronoun use. For example, I did not use a picture of Skippy Jon Jones (a cat who believes himself to be a Chihuahua in a series of popular children’s picture books by Judy Schachner), but, perhaps, the students love those books and have read all of them repeatedly. The librarian at Frank enjoys these books and has read them to the students so that might be an influence. What is certain, is that Cralley and Ruscher were correct in their assertion that cognitive busyness is extremely useful, if not downright necessary, in gaining a more accurate insight into the subconscious decisions of research participants.

Overwhelmingly, students use neutral pronouns, even on gendered subjects. While a few students actually corrected themselves when using a gendered pronoun by saying “I mean it,” not a single student used a neutral pronoun and then corrected to “I mean he,” or “I mean she.” Should we be worried that instead of making a decision regarding the gender of the subject or
balancing the number of gendered pronouns amongst subjects, that children
decide to use a neutral pronoun such as “it?” Is this an indication that instead of
seeing equality, children respond by dehumanizing subjects? Is it easier for them
to just ignore gender whenever possible? Are they concerned about using the
“wrong” gender and, thus, avoid the possibility through a third option – that of
neutral pronouns? What happens when these same children are placed in a
situation where a neutral pronoun is not an option – when they must designate
activities and occupations as belonging to either a male or female?

Most of these questions will need to be explored through further research.
However, the last question, regarding students’ gendering of various activities and
occupations, was examined, and is described in the next section.

FINDINGS REGARDING STUDENTS’ GENDERING OF VARIOUS
ACTIVITIES AND OCCUPATIONS AS SEEN BY PRONOUN ASSIGNMENT

In the last thirty-five years, research into gender roles has focused on
breaking the barriers that hold occupations and activities in stereotypical molds.
Society, led by educators and parents, has spent countless hours and dollars
teaching future generations that people’s gender should not disqualify them from
certain occupations or activities, nor should they earn less respect or monetary
compensation for engaging in those occupations or activities.

SOCIETAL CHANGE

Ask most children if a girl can be a doctor, pilot, or construction worker
(all considered stereotypically male jobs) and they will quickly respond with the
engrained and politically correct answer, “Of course.” Boys and girls alike know
that the “correct” answer is, “Of course girls can be doctors.” But is that what they truly believe or do they just know they are supposed to give that response?

Conversely, what about our boys? Are they as protected and supported in their dreams to become nurses, elementary school teachers, and stay-at-home dads? If a little boy says he wants to be a dancer, do we automatically sign him up for hip-hop class and hope he doesn’t see the sign for ballet, all the while congratulating ourselves on our open-mindedness for letting him take dancing at all? With the recent information on the health benefits of crying, do we encourage our sons to let out their emotions? If his favorite color is pink and he asks for a doll for Christmas, do we rejoice in his denial of arbitrary color-to-gender matching and encourage him to nurture his caregiver instincts because it will make him more sensitive, nurturing, and able to better cope with uncomfortable situations – exactly the characteristics we hope for in a future son-in-law? (Sonna)

And, ultimately, what messages, i.e. hidden curricula, are really getting through to our children? We preach equality but are we actually getting female superiority? Are we, as Christina Hoff Sommers suggests, potentially on the path to becoming a society that turns against its male children because they are “politically incorrect?” (Sommers). Who decides which characteristics are male or female, much less which are better or more evolved?

ACTIVITIES

This part of the research most closely aligns to Nilsen’s 1973 study because the same activities and occupations were used. However, because the
total number of participants in the two studies differed, findings will be reported in percentages rather than whole numbers or ratios.

There have been some significant changes in children’s responses from thirty-five years ago. Most notably, 43.4% more children responded in the masculine regarding the activity of wearing new shoes, which was projected in the original study to be a neutral activity, but was given a majority of feminine pronouns. In the current study, this sentence came close to a complete role reversal of masculine and feminine responses (only a 3.3% difference). The most surprising difference between the 1973 and the current study is that 42.3% more children responded with a feminine pronoun for the activity of winning the race. As competition is still considered a more masculine trait and most picture books still portray females in sedentary roles this came as the biggest surprise of the results.

In every feminine stereotyped sentence, the percentage of feminine responses dropped with the greatest drop evidenced in the sentence “The child was sitting by the swings” with a 19.3% change. 10% fewer children responded with a feminine pronoun to the sentence “The child was baby-sitting” and 9.7% fewer children responded with a feminine pronoun to “The child was crying.” The least amount of change occurred with the sentence “The child was very pretty” with only a 4.3% decrease in feminine pronouns. However, as the adjective “pretty” is still considered to be a feminine one, any drop here was a surprise.
Only one masculine stereotype saw gains with 1.7% more children responding with a “he” to the questions “The child was building a robot.” One kindergartener (male) asked “What’s a robot?” When I responded with “A small metal toy that usually looks like a person,” he said “I guess, wasn’t he.” There were other confused looks, especially from the younger ones, when asked this question and I wonder if more children did not know what a robot is and assigned a pronoun to it based on some other system (i.e. respondent’s own gender). The other three stereotypical masculine activities received an increase in attribution to females, thereby moving more toward an equal representation. 3% more children attributed “being tough” to females, 6% more children attributed “fighting” to females, and as mentioned earlier, an overwhelming increase of 42.3% of children chose the feminine pronoun to complete “The child was winning the race.”

There could be several explanations as to why this particular activity saw the greatest increase. In 1972, Title IX was passed, requiring that students not be denied participation in or benefits from any program due to gender. Most people, even educators, associate Title IX with athletics, although no explicit mention was made of athletics in the original language. Because Title IX, implicitly in the original language and explicitly in later addendums and interpretations, requires women’s sports to receive the same support, including financial, as men’s sports, many have complained that while the intention of Title IX was improving women’s sports, the reality is the dismantling of men’s sports to fund women’s sports.
The difficulty, however, is in determining whether that is the actual, and only, cause for the dismantling of certain athletic programs across the nation. Budgetary woes are a reality and universities that can fund only one baseball program but are required to fund two, will fund none rather than risk being labeled as non-compliant, which would involve subsequent penalties. However, even though institutions of higher education claim they are having to scale-back on athletic opportunities for both genders, professional women’s athletics are on the rise.

However, in 1972, when Title IX was passed, over 90% of college women’s teams had a female head coach. By 2006, that percentage had dropped to 42.4%. Some believe that the increase in money that has been pumped into women’s athletics since the passage of Title IX has encouraged men to vie for the head coaching jobs on women’s teams because these salaries are now competitive. For examples, in 2008, eight of eleven ASU women’s sports teams were coached by men but the director of the entire athletic program is a woman (Metcalfe).

One of the women athletes now serving as a role model for girls is Justine Siegal, who, on February 21, 2011, became the first woman to pitch batting practice for a major league baseball team. Siegal has been a college-baseball coach, an International Baseball Federation coach, and the first woman to coach men’s professional minor league baseball. In 1998, to celebrate the birth of her daughter, Siegal started an organization to promote baseball for girls, including fighting for girls who are told they cannot play on their school’s baseball team.
because they are girls. However, Siegal still had to deal with team members’ taunts of “Go on, Ponytails. Give it to me,” and being told that she would have to bring her own pants because MLB regulation pants were made for men. Still, Siegal’s daughter was sitting in the stands, along with many other young girls and future world leaders, and an impression was certainly made (Rose).

Children’s and young adult books have contributed as well. Katherine Paterson’s *Bridge to Terabithia* portrays a deep and lasting friendship between Jesse and Leslie. When Leslie moves into town, her unlikely friendship with Jesse begins when she beats him in a footrace; replacing him as the fastest kid in school. *The Daring Book for Girls* series showcases great women in history while encouraging an independent spirit and love of adventure for each reader.

It is interesting to compare specific masculine and feminine stereotypes and the response changes. For example, the combined response increase in assigning feminine pronouns to the activities of “fighting” (6%) and “being tough” (3%) is close to the 9.7% increase in the number of children who assigned the masculine pronoun to “crying.” The decrease in respondents who labeled certain sedentary activities (watching TV – 11.7%; sitting by the swings – 19.3%; was pretty – 4.3%) with a feminine pronoun combined with the dramatic increase in physical activities (winning the race – 42.3%) reflects either the drive to have more girls be more active or the reality of increased activities for girls; or, perhaps, a combination. Interestingly, however, Nilges and Spencer’s study relating gender and physical activity levels in children’s literature, showed that even though male characters were more often represented than female characters,
“regardless of gender, sedentary roles were significantly more likely to be portrayed than active roles” and that “this condition did not change significantly over the three time periods tested” between 1940 and 1999 (Nilges and Spencer 135). While the reason for this may be simply because it is easier to draw characters engaged in passive rather than active roles, it warrants further investigation.

It would be interesting to repeat the tag questions after changing them to more 21st Century activities. For example, what would the responses show if “watching TV” was changed to “playing video games” and “talking” was changed to “texting?” What if the participants were middle or secondary students?

The boys’ responses to the statement “winning the race” shows the most dramatic changes from year-to-year. Half of male kindergarteners – average age of five – responded with “he” to this question but only 14.3% of male first graders did – average age of six. The percentage increased dramatically (up to 66.7%) in male second grade responders – average age of seven – and then declined to 50% for third grade – average age of eight. The fourth graders – average age of nine – increased again to 66.7% and then the second-lowest percentage was given by fifth graders (37.5%) – average age of ten.

The girls’ responses to this same question ranged as well but not as dramatically as the boys’. Two-thirds of kindergarten girls responded with “he” while only half of first and second grade girls attributed “winning the race” as a masculine trait. That number declined to 40% for third grade girls and then jumped to its highest of any groups’ response to 71.4% from fourth grade girls.
Only 20% of fifth grade girls attributed “winning the race” as masculine. Perhaps this dramatic change is related to the fact that girls tend to enter puberty earlier than boys, and at this particular stage of development it is not uncommon for girls to be taller, stronger and faster than boys?

OCCUPATIONS

Every occupational category showed changes in students’ responses reflecting a shift towards gender equality. In traditionally feminine occupations (nurse, teacher, dancer, secretary, and cook), fewer students responded with “wasn’t she,” allowing for a more masculine presence in these roles. Likewise, in traditionally masculine and gender neutral occupations (boss, doctor, author, clerk, truck driver, plumber, and farmer) more students replied “wasn’t she” allowing for a greater feminine presence in these occupations. Compared to the change in actual labor statistics, students’ responses reflect a greater attitude toward occupational equality in gender than reality in every category except boss and clerk.
TABLE 5

COMPARISON OF STUDENTS’ FEMININE RESPONSES IN 2009 AND ACTUAL LABOR STATISTICS FOR FEMALES IN 2008.

<table>
<thead>
<tr>
<th>OCCUPATION</th>
<th>STUDENT RESPONSES</th>
<th>ACTUAL STATISTICS</th>
</tr>
</thead>
<tbody>
<tr>
<td>NURSE</td>
<td>99%</td>
<td>82.7%</td>
</tr>
<tr>
<td>TEACHER</td>
<td>91%</td>
<td>66.7%</td>
</tr>
<tr>
<td>DANCER</td>
<td>87%</td>
<td>61.3%</td>
</tr>
<tr>
<td>SECRETARY</td>
<td>86%</td>
<td>48%</td>
</tr>
<tr>
<td>COOK</td>
<td>63%</td>
<td>44%</td>
</tr>
<tr>
<td>BOSS</td>
<td>1%</td>
<td>44%</td>
</tr>
<tr>
<td>DOCTOR</td>
<td>8%</td>
<td>42.7%</td>
</tr>
<tr>
<td>AUTHOR</td>
<td>21%</td>
<td>40%</td>
</tr>
<tr>
<td>CLERK</td>
<td>46%</td>
<td>37.3%</td>
</tr>
<tr>
<td>TRUCK DRIVER</td>
<td>2%</td>
<td>21.3%</td>
</tr>
<tr>
<td>PLUMBER</td>
<td>5%</td>
<td>17.3%</td>
</tr>
<tr>
<td>FARMER</td>
<td>2%</td>
<td>14.7%</td>
</tr>
</tbody>
</table>

In the student responses from 1973 to 2009 there occurred a great increase in the number of responses which give a feminine pronoun to traditionally masculine occupations. The “masculine” occupations – boss, doctor, author, truck driver, plumber and farmer – all saw an increase in the number of students responding with a feminine pronoun (+43%, +34.7%, +19%, +19.3%, +12.3% and +12.7% respectively).

The “feminine” occupations – nurse, teacher, dancer, secretary, cook and clerk – also saw drops in the number of students responding with a feminine pronoun (-16.3%, -24.3%, -25.7%, -39% -19% and -8.7% respectively). The

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6 Elementary and Middle School teachers.
7 N/A = Not Available.
combination of these increases and decreases shows a decided movement towards children’s perceptions of a variety of occupations being less stereotypical per gender. But does reality mirror perception?

According to the actual statistics, women have made advances in all four of these “masculine” occupations (boss, doctor, truck driver, and farmer) with the greatest advance being in the field of medicine. Although women haven’t gained the full 34.7% perceived by students, there are 23.5% more female doctors in the United States having gained over 400% from 1969. While the percentage of female truck drivers has increased only by 2.9% it is important to note that this is more than double the number from 1969.

Conversely, the percentage of females holding traditionally “feminine” jobs has decreased, assumedly with those jobs being taken over by males, furthering the trend of more equality in the work place for both sexes. The decreases here are fairly close to the increases on the other end of the spectrum. For example, while the percentage of female doctors has increased by 23.5% the number of female cooks has decreased by 23.9%. Where there are now 7.4% more female farmers, there are 6.3% fewer female nurses.

SUMMARY AND CONCLUSIONS REGARDING CHILDREN’S EXPECTATIONS REGARDING ACTIVITIES AND OCCUPATIONS

We see that gains have been made, in both directions, toward equality perceptions regarding activities and occupations. Responses from both male and female students indicate a greater acceptance of females participating in stereotypically masculine activities (being tough, winning the race, fighting, and
building) and occupations (boss, doctor, author, clerk, truck driver, plumber, and farmer). Fortunately, we also see an increased acceptance of males participating in stereotypically feminine activities (sitting, crying, babysitting, and being pretty) and occupations (nurse, teacher, dancer, secretary, and cook). If as stated in overly simplified terms, we are looking for gender equality by way of 50/50 response in all categories, we are well on our way to achieving that goal.

However, what is not indicated here is the value perceived in each activity and occupation. Students are more likely to assign a masculine pronoun to the activity of crying (42.7%), but does that mean they consider it is good thing; or do they still see crying as a weakness and perceive more boys to be weak? Have the children’s perceptions of the suitability of the activity or occupation changed or is it just their willingness to allow the “other” gender to participate? Do children see a sport as being appropriate for both boys and girls, or are they just allowing girls to be more “boyish” in their participation?
CHAPTER 5
SUMMARY AND RECOMMENDATIONS

While examining recently published books for young children, I found that a gender bias remains, although not as great as it was thirty years ago; boys are portrayed more often than girls (approximately three-to-one). Although the traditionally given reason for using anthropomorphic animals in place of human characters is to avoid race, ethnicity, religion, age, and other possibly polarizing and identifying characteristics in an effort to reach readers on a universal level, male animals are portrayed at an almost five-to-one ratio over female animals. With a few notable exceptions, when females are portrayed, either as humans or animals, they are still assigned to sedentary or household activities. Thus, children’s first textbooks, condoned and repeatedly visited by adult caretakers, are often masterpieces of gender-biased and stereotypical literature.

Considering the ability of early instruction to create lifelong beliefs, the responses that children made when they were called on to assign gender through providing tag questions at the ends of sentences where the subjects’ were identified in gender-neutral language was surprising. The children’s completion of the sentences with either wasn’t he? or wasn’t she? in relation to activities and occupations reflected a greater equality than I found either in real-life statistics or in children’s literature. Students at all observed grade levels (Kindergarten through fifth) were more willing to assign female pronouns to stereotypically male activities and occupations than were authors and illustrators. Most inspiring was the children’s willingness to assign gendered pronouns at a closer to 50/50
male/female ratio than are shown by current labor statistics. Perhaps this foreshadows a greater gender equality as these children become the next generation’s writers, illustrators, and workers.

In the original 1973 study, it was hypothesized that more feminine pronouns would be used by females than males. In that study, as in this one, that was not proven to be the case as the number of males and females utilizing female pronouns is fairly equal.

A finding in the 1973 study was that females were more loquacious than their male counterpoints. While total word use was not counted, the number of pronouns (masculine, feminine, and neutral) was. In 1973, the fifty female students used a total of 1,593 pronouns compared to the fifty boys’ 1,427 (Nilsen 56). The difference was much stronger in my study where the 45 female students used a total of 1,378 pronouns compared (an average of 30.6 pronouns per female student) to only 797 used by the 33 boys (an average of 24.2 pronouns per male student). In both studies, the vast majority of these pronouns were neutral with the choice of using neutral pronouns even more pronounced in the more recent study.

What was more interesting, and disturbing, in the current research findings was that parents and teachers hope we are making gender more equal but what is actually happening is that children decide to avoid the issue of gender appropriateness and stereotypes altogether and simply delete gender by using neutral pronouns. This deletion reminds me of students who are not certain that they have the right answer so they refuse to participate in class; they would rather
be thought of as stubborn than stupid. The situation may also be similar to the way that many adults now use that as a relative pronoun referring to humans because they want to avoid risking using the wrong form of who or whom. For example, “The police officer that gave me a ticket was nice,” vs. “The police officer who (or whom) gave me a ticket was nice.”

Authors believe that not assigning a gender to animal characters allows children the choice of deciding gendered pronouns themselves. However, this seems to work against the desire of authors who are trying to write stories about personified animals in a friendly and intimate manner. Their whole point is to be inclusive and to allow children to identify with fantasy characters regardless of color, ethnicity, age, size, and gender. But by not labeling their characters as either male or female, they are leaving young readers to decide on gender. It also leaves the illustrator to decide on how to paint the characters, and without guidance from the author, few artists are going to take it upon themselves to make a character female if their minds work in a similar way to those of the children in both the 1973 and the 2011 studies. These studies show that the majority of people – whether they are adult illustrators or young readers – need a reason to assign feminine gender to a character. Despite efforts to no longer use the universal he, it seems as though the default gender for most people is either male or, at a greater percentage and whenever possible, neutral.

I wonder what that does to kids – to make a living thing neutral – the same as if it was an inanimate object. If non-living things have no gender, does removing gender take the life out of the thing - at least in their eyes? And does
that make it somehow less important or less real? Does that make it easier to treat others without respect and kindness - to underestimate the value of humanity if you refer to people as its? And what about the cases where inanimate objects such as cars and boats are referred to as she? Traditionally, this is because males are the builders and operators of these vehicles and claim they use feminine pronouns to refer to the object’s temperamental nature and the necessity for constant care.

In regards to native Spanish speakers’ pronoun decisions contrasting to native English speakers’ pronoun decisions, the evidence is not there. Several factors could contribute to this. Most notably, the level of fluency in native language was not examined. It is possible that, although these students are classified as English Language Learners, they may not be fluent enough in Spanish for it to affect gendered pronoun choice. It is possible that conducting this research with an older population who was fluent in Spanish for years before learning English would show different results.

It is also possible that native language does not play a significant role in pronoun choice, regardless of the level of Spanish fluency. Perhaps, a more decisive factor is the individual’s personal experience with a particular animal. The fact that the most gendered pronouns were given to the cat and dog, the two animals students are most likely to have had as pets, supports this hypothesis. In further research, I believe having participants complete a survey stating any pets they have had (species and gender) as well as a determination of participants’ Spanish fluency, will better aid researchers with answering these questions.
The tag question portion of my research provided a deeper look at children’s views of gender because using a neutral pronoun was not an option; unlike the animal identification section, students had to answer with either a male or female pronoun. That so few children thought to assign feminine gender to the characters neutrally identified as the child, during the activity questions, may have some implications for those of us who teach English composition and discourage students from using such phrase as “he/she” and “her or his.” Even though I am strongly in favor of language that is fair to both sexes, I have long discouraged students from using the dual constructions because of their “clumsiness” and the way that they interrupt sentences and draw attention to the matter of gender, when it is not really the focus of the sentence. For example, I usually show students how to rearrange Sentence A into something closer to Sentence B so as to have a plural referent making it “correct” to use a non-gendered plural pronoun.

A. Each student will be responsible for his or her own identification documents.

B. All students will be responsible for their own identification documents.

However, my findings in this study are making me question my rejection of the dual pronoun usages because my research seems to show that most people need a “trigger” to think of a female as being the referent of purely neutral words. It is amazing that in the 1973 study, out of 3,020 pronouns that 100 children used when talking about personified animals, they used only seventeen feminine pronouns as compared to 1,542 masculine pronouns and 1,461 neutral pronouns.
My findings also lead me to question the “fairness” and the wisdom of some publication style guides for scholarly journals which no longer print both the given and the surnames of their authors. Some use only the surname, while others use an initial of the given name plus the surname to identify authors of articles or of people who send in proposals for conferences. The custom developed in the 1970s and 1980s because of suspicions that the work of women intellectuals was being judged unfairly. The idea was that if given names were hidden, then reviewers of proposals and readers of articles would not know whether the writer was male or female and would therefore give a fairer reading.

However, if as this research seems to show, people do not think of females without some trigger, then the practice of identifying scholars only by their surnames may be counterproductive because surnames are generally viewed as males and so the practice may promote the idea that the “smart” people doing research and writing are males. If so, it will hardly promote equality in academia if the majority of readers, even female ones, believe all the research is being authored by males.

One reason that surnames are viewed as male is that for centuries surnames have been taken from the males in a family. Patronyms (words from the father of a family) in various languages range all the way from such common English names as Peterson, Nilsen and Jensen to such less common names as Ben Gurion (Hebrew), McDonald or O’Donnell (Scottish), Kolovich (East European), Ebnasena (Arabic), and Fitzgerald (Celtic). It may now be time to reconsider the practice of leaving women’s given names off from their writing so as to
communicate to new generations of readers that women are capable of being scientists, researchers, and writers.

The publishers of the Harry Potter books purposely chose not to identify Joanne Rowling as the author because they did not want to discourage boys from reading the fantasies. They wanted two initials and Rowling did not have a middle name so she borrowed the K from a grandmother’s name. This mirrors the frighteningly prevalent belief that boys will not read girl books but girls will read boy books; therefore, teachers should assign boy books to better ensure that a majority of students will actually read the text. It is probably impossible to say at this stage of the game whether hiding the fact that she was a woman helped the books to become so famous. But certainly, it has been good for both boys and girls that almost everyone knows she is a female and got to be the richest woman in the world through her own skill and hard work rather than through marrying a prince.

Not all of the findings in the current study are discouraging. Changes in attitudes do occur as shown by the surprisingly big difference in the tag questions “The child was winning the race, wasn’t she,” and “The child is tough, isn’t she?” In every one of the ten activity questions students’ responses in the current study showed a move toward a more equal gender distribution. Likewise, in both studies, children’s responses were closer to gender equality than actual labor statistics of either year. I believe this foreshadows a time when occupations will reflect a true gender equality as each generation strives to create a world that already exists in their minds.
What is now needed in the publishing world of books for young children is that authors, artists, editors, and publishers be educated to the fact that while fantasy characters are wonderful because children can identify with the characters regardless of color, ethnicity, size, etc. this does not hold true for gender. It is not enough for authors to think that by avoiding the use of masculine or feminine pronouns, they will be fair to female readers. They need to understand that characters—whether personified animals, people, or other fantasy creatures—need to be identified by gender. This does not mean in the old way, when all characters were males except if there was a particular reason for them to be female as in Arnold Lobel’s *Fables*.

In Lobel’s twenty fables, there are thirty-five male characters and eight female characters. These females include a bossy wife, two silly geese, a beautiful ostrich that stands in the background as the object of a male’s affections, a bad mother, and a vain rhinoceros that falls for the smallest bit of flattery. The most stereotypical is a camel who dreams of being a ballet dancer. When the audience calls her “lumpy and humpy…baggy and bumpy…You are not and never will be a ballet dancer,” she decides that she will just dance for herself. This 1980 book won the Caldecott medal.

Fifteen years later, another Caldecott medal winner tells the story of Officer Buckle and his partner, Gloria, who travel to schools and give safety lectures. And while the message of the book, that safety is vital, is a valuable one, it is just as important to realize that Gloria represents the trickster archetype – and is a dog.
Children’s books are written by adults, making the study of adult social attitudes as evidenced through author pronoun selection a highly interesting endeavor. I cannot currently perceive of a time when I will read to my children, or listen to them read to me, without questioning the author’s pronoun choice, or illustrator’s representation. In thirty years, I will be excited to re-read the Caldecott winners of the past three decades to see if my predictions of character equality are correct. I believe there will be more females represented in neutral, and even stereotypically masculine activities, whether as humans or animals. However, I think we will still be trying to solve the third-person pronoun problem.
Works Cited


Conkright, Lea, Dorothy Flannagan and James Dykes. "Effects of Pronoun Type and Gender Role Consistency on Children's Recall and Interpretation of Stories." Sex Roles (2000): 481-496.


Evans, Janet. "Princesses are not into war 'n things, they always scream and run off": Exploring gender stereotypes in picture books." READING (1998): 5-11.


To: Aileen Nilsen  
LL
From: Mark Rosas, Chair  
Soc Beh IRB
Date: 05/05/2009
Committee Action: Expedited Approval
Approval Date: 05/05/2009
Review Type: Expedited F7
IRB Protocol #: 004003973
Study Title: Grammatical Gender Related to Children's Perceptions of Male and Female Roles
Expiration Date: 05/04/2010

The above-referenced protocol was approved following expedited review by the Institutional Review Board.

It is the Principal Investigator's responsibility to obtain review and continued approval before the expiration date. You may not continue any research activity beyond the expiration date without approval by the Institutional Review Board.

Adverse Reactions: If any untoward incidents or severe reactions should develop as a result of this study, you are required to notify the Soc Beh IRB immediately. If necessary, a member of the IRB will be assigned to look into the matter. If the problem is serious, approval may be withdrawn pending IRB review.

Amendments: If you wish to change any aspect of this study, such as the procedures, the consent forms, or the investigators, please communicate your requested changes to the Soc Beh IRB. The new procedure is not to be initiated until the IRB approval has been given.

Please retain a copy of this letter with your approved protocol.
Dear Parent or Guardian:

Frank students already know me as I have been working with Frank teachers and ASU student teachers every Thursday for the last four months. I am also a graduate student researcher under the direction of Professor Aileen Niven in the College of Education at Arizona State University. This letter is to invite your student to participate in a research study I'm doing on children and grammar. Mrs. Kadel and your student's classroom teacher have agreed to let me work with the wonderful students at Frank. Because I wish to work with children who are under 18, I need to have parent/guardian approval. I am writing to ask your permission to work with your student.

Your child's participation in this study is completely voluntary and should last no more than 15 minutes. Your student will be pulled out of the classroom and taken to the school library for the activity. As the classroom teachers know and have agreed to this project, I am working to schedule each session so that your student will not miss anything detrimental to their education. The process is simple, fun and happens in three parts.

- First, the student will look at a few pictures of animals from children's books and describe those animals to another student who guesses what animal is being described.
- Second, the student has animals described to him or her and gets to guess what animal is being described.
- Third, the student answers a few questions about different types of jobs and activities. In similar studies, students have enjoyed participating.

Your choice to allow or not allow your student to participate will not affect the student's education or grades in any way. Likewise, if your student chooses to not participate there will be no penalty. Each student who participates will be assigned a number for the purposes of this study so that no individual student's information can be identified and all information will be confidential. The results of this research may be used in reports, presentations, and my dissertation but your student's name will not be used. Although there may be no direct benefit to your student, participation in this research project will potentially improve the way that teachers understand how grammar skills develop in children.

If you are willing to let your student be a part of this study, please sign the permission slip below and have your student return it to his or her classroom teacher by Friday, May 8. If you have any questions, please feel free to contact me by phone (480-727-3023), email (Lisa.Anter@asu.edu) or leave a message at Frank's front office. If you have any questions about you or your child's rights as a subject/participant in this research, or if you feel you or your child have been placed at risk, you can contact the Chair of the Human Subjects Institutional Review Board, through the Office of Research Integrity and Assurance, at (480) 965-6788.

Sincerely,

Lisa Arter

I agree to allow my student to participate in the children and grammar research project.

_________________________________________  ____________________________
Please Print Student's Name                         Date

_________________________________________  ____________________________
Please Print Parent/Guardian's Name                 Date

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Lisa Arter
PO Box 871011
Tempe, AZ 85282
April 29, 2009

Dear Frank teacher,

As some of you may already know, in addition to being the ASU site professor for Frank, I am also completing my doctorate in Curriculum and Instruction at Arizona State University. For my dissertation, I am doing research on Grammatical Gender Related to Children’s Perceptions of Male and Female Roles. Bernadette has graciously given me permission to do my dissertation research at Frank school. I am very excited about the opportunity to further work with your wonderful students. Ideally, I need 20 students at each grade level K-5. Of these, 10 males and 10 females with 5 of each gender being English primary language and 5 being Spanish primary language speakers (as identified by placement in ELD classes). I estimate that it will take only 15-20 minutes with each student and Theresa has given me permission to use the library to talk with them. The process is simple and should be fun for the students.

I am inviting your participation which would involve allowing me to send the permission letter home with your students and have them bring the signed form back to you by Friday, May 8. Then, during the following week, I will call students who have permission out to participate in the research. I would like for you to choose the first two students (from those who’ve received permission) and then the returning student can choose the next participant and send him/her to the library. I believe that the interruption to your class should be minimal – basically a student returning every 15-20 minutes and choosing the next one to leave for 15-20 minutes. I will need 5 boys and 5 girls from your room so we won’t even need to pull out everyone. If there is a particular day/time that would cause you the least amount of inconvenience, please let me know. Your participation in this study is voluntary. If you choose not to participate or to withdraw from the study at any time, there will be no penalty.

While in the library, students will describe pictures of animals from storybooks and then answer a few tag-sentences (i.e. I will say “The nurse gave the patient a shot” and the student will respond with “Didn’t he?” or “Didn’t she?”) I am studying ways in which students process grammatical gender through 3rd person pronoun choice. I am not looking for things they’ve been “taught” but rather a natural language response. I am curious to see the difference in choice not only between girls and boys but L1 and L2 students as well to see if there is a difference in those whose primary language is gendered.

Children will be assigned a number for data reference and no child’s, or teacher’s, name will be used in my dissertation or subsequent publications based on this research.

In return, you will not only receive the warm fuzzy feeling of helping a fellow teacher learn more about grammatical gender and children’s stereotypes of male/female roles (won’t that be fun) but I have made arrangements to donate a few books to the classrooms that participate.
I know that the end of the year is busy and one more thing can simply be a pain in the rear but I really believe it won’t be a horrendous imposition (or I wouldn’t do it) and I’m hoping that now that the AIMS testing is over it won’t be an imposition at all (or at least only a very little one).

If you have any questions concerning the research study, please contact me via email (Lisa.Arter@asu.edu) or phone (480-727-3923). You are also welcome to contact my dissertation chair, Dr. Alleen Nilsen, at Alleen.Nilsen@asu.edu or 480-965-9577. If you have any questions about your rights as a subject/participant in this research, or if you feel you have been placed at risk, you can contact the Chair of the Human Subjects Institutional Review Board, through the ASU Office of Research Integrity and Assurance, at (480) 965-6788.

Thank you for your willingness to help.

Sincerely,

Lisa Arter
Grammatical Gender Related to Children's Perceptions of Male and Female Roles

I have been told that my parent or guardians have said it's okay for me to take part in this project.

I will be asked to look at storybook pictures of animals and answer some questions.

I am taking part because I want to. I know that I can stop at any time if I want to and it will be okay if I want to stop.

Sign Your Name Here  Print Your Name Here

Date

[Signature]

ASU IRB Approved

Sign on File Page

Date 8/13/03 5/14/00
Grammatical Gender Related to Children’s Perceptions of Male and Female Roles

I have been informed that my parent(s)/guardian(s) have given permission for me to participate in a study concerning grammar.

I will be asked to describe pictures of animals to another student, guess which animal is being described to me, and answer some questions.

My participation in this project is voluntary and I have been told that I may stop my participation in this study at any time. If I choose not to participate, it will not affect my grade in any way.

Signature ____________________________ Printed Name ____________________________

Date ____________________

ASU IRB
Approved
Sign GJ 5-14 Male Course
Date 5/28/14 - 5/31/14