Health in Children's Books:

Alopecia v. Other Medical Conditions

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Introduction

Media, in all forms, can be used to communicate and teach a variety of things. This goes for television, movies, music, and even social media. One medium, that could tend to be overlooked unless you know someone in the target age range, can be very crucial in communicating ideas at an early age: children's books. These books can be used to show kids how to share, or to help them speak, or simply to help them learn something that has happened in the past. Children's literature can even be used to shape a child's understanding of a health issue. A book about a health issue, like cancer or depression, could help a child understand what they or a loved one are going through physically and/or mentally by explaining the sickness in simple terms. A book could also make a child feel a little less lonely by having relatable characters that are going through the same experiences and having to work through the same feelings. A book like that could hold a lot of power over shaping a child's perspective on a health issue, whether they realize it immediately or it takes a little while for the story to really sink in.

There is a disease called alopecia areata. It is an autoimmune disease that basically attacks a person's hair follicles and causes their hair or patches of hair to fall out. There are three main types:

- 1. Alopecia areata: this causes a person to lose patches of hair (there are multiple variations of this type)
- 2. Alopecia areata totalis: this causes a person to lose all the hair on their scalp
- 3. Alopecia areata universalis: this causes a person to lose all the hair on their body, including eyelashes

Alopecia is not contagious, and there is not a real connection for getting it through family lines. People who have it are not dying from it, as someone might assume from how people lose their

hair through chemotherapy treatment for cancer. A person's hair does not always grow back if they have alopecia, unlike someone who has gone through chemotherapy. Hair could also grow back and fall out again, multiple times. Doctors believe the main source of this disease comes from stress, but there is no real reason for people losing their hair like this. While there are various treatments people can try, there is no real cure for alopecia. According to the National Alopecia Areata Foundation (NAAF), alopecia "affects as many as 6.8 million people in the U.S. with a lifetime risk of 2.1%" (para. 1). Any person, regardless of age, sex, or ethnicity, could develop alopecia. The NAAF also says it most commonly first appears in childhood. This where children's books become relevant to the subject.

There are a handful of resources for children in regards to alopecia. There are a few websites that also have various resources like the NAAF and Children's Alopecia Project. However, a quick search on the Internet will find books like: Princess Alopecia (Peterseil & Katz, 1999), Where's Your Hair, Hannah? (Green, 2017), Hair In My Brush (Young, 2018), Happy As I Am (Carrow, 2018), Hello My Name is Jenny: I Have Alopecia (West, 2019), and Beautifully Bald (Pigatt, 2019). One picture book called The Girl With No Hair: A Story About Alopecia Areata (Murphy-Melas, 2003) is about a girl who actually had alopecia recounting her life. Another picture book called Who Are You?: Ella the Enchanted Princess (Calafati, 2017) is the first in a series about Ella. There is one book called *Because of Anya* (Haddix, 2004) that is not a picture book, but a chapter book about a 10-year-old girl who has alopecia, so it is still aimed at younger kids. Most of these resources, including the websites, seem to explain the basics of alopecia but are mainly focused on talking about uniqueness, being who you are, and not excluding someone because they are different. The Children's Alopecia Project even has a

letter parents can use to give to their child's class to explain alopecia and what their child is going through.

Books like these could be very crucial in helping a child understand what is happening when they or a friend of theirs has alopecia. While there are not really any other physical ailments to having alopecia, there could be great psychological affects in regards to self-esteem or mental health. These books could also be used to explain alopecia to classmates or friends as means of hopefully creating an atmosphere of inclusion and not one of teasing, which much of the existing literature seems to aim at doing.

This study is interested in seeing how children's literature about alopecia compare to books about other medical conditions in how they communicate their stories. The results of this study also aided the researcher in writing their own children's book about alopecia. The researcher used the findings from the content analysis in relation to the research questions to create the plot and underlying lesson, how much detail of the medical condition to put it, and how the narration guided the story.

Review of the Literature

Learning About Health Through Media

For the purposes of this section, the researcher will focus on three major forms of media that students and children can learn about health from: (a) movies; (b) television shows; and (c) books. The researcher will also be looking specifically at health as it pertains to illnesses, diseases, and medical conditions.

Movies. Both fictional and nonfictional movies can serve to educate people about different illnesses and diseases. Documentaries could be considered the most efficient in

communicating every detail they need to about the illness or disease since they are nonfictional. There are also fictional movies that are based on real stories. While these stories do take liberties in some of the aspects of their storytelling, many of the aspects are true. One of these is *The* Theory of Everything (Marsh, 2014) that tells the story of physicist Stephen Hawking and his wife, and his development of amyotrophic lateral sclerosis (ALS).

Then there are also straight fictional movies about illness and disease. Several of these movies also originally come from books, and a lot of the popular ones highlight cancer. For example, there are movies like: A Walk to Remember (2002), My Sister's Keeper (2009), and The Fault in Our Stars (2014). Other movies not about cancer that are also based on books include films like: Shutter Island (2010) that focuses on someone who has gone insane and involves someone who is bipolar, Silver Linings Playbook (2012) that involves someone who is bipolar, Everything, Everything (2017) that involves someone who has severe combined immunodeficiency (SCID), and Five Feet Apart (2019) that deals with cystic fibrosis. While many of these films aren't necessarily made to be educational, it could be how some people learn the basics of these different illnesses.

Television Shows. Television shows tend to follow along the same track as fictional movies where they aren't necessarily educational, but do discuss different illnesses. There is one show called *Alexa and Katie* (Wordham, 2018) where the main storyline is the relationship between best friends Alexa and Katie, but they have to deal with the aftermath of Alexa getting cancer and recovering from it. There is another show called A Million Little Things (Nash, 2018) and while it is a heavily dramatized show, the characters have to deal with things like breast cancer and depression, and even the fallout from a suicide due to depression. There is one show based off of a Marvel Comics character, Legion (Hawley, 2017), who has schizophrenia and also has psychic abilities. There are also medical dramas like *Grey's Anatomy* (Rhimes, 2005) that highlight several different medical conditions and illnesses throughout its episodes, and *The* Good Doctor (Shore, 2017), which not only highlights various illnesses and medical conditions, but focuses on one doctor who has autism and the challenges he faces in his profession.

Now, in regards to nonfiction TV, there are a handful of shows that have the potential to discuss various medical conditions and illnesses. Some of these could include: The Doctors (McGraw, 2008), The Dr. Oz Show (Oz, 2009), and Chasing the Cure (Curry, 2019). Although, the first two do focus more on overall health and not always on specific medical conditions. Students could also get their information about different medical conditions from the news. Whether it be 15 seconds long or a whole segment with a guest, either local news or national news is bound to pick up several medical stories in a day.

Books. As mentioned previously, there are several books about health issues that have been turned into movies. There are also nonfiction books about various medical conditions and illnesses like: When Breath Becomes Air (Kalanithi, 2016) where the author tells his story from being a neurosurgeon student to having stage IV cancer, and Brain on Fire: My Month of Madness (Cahalan, 2012) where the author tells her story of going insane and coming back from it. There are also, of course, various health textbooks that are used for school.

And then, there are children's books. As mentioned above, there are a handful of books about alopecia, but that does not reflect full scope of children's books about different illnesses and medical conditions. For example, two studies that are being used as model studies for this researcher, and that will be discussed further in detail below, used 42 different books on the subject of maternal cancer (Huang, Lee, Hu, Gao, & O'Connor, 2014) and 90 different books on the subject of learning disabilities (Prater, 2003), respectively. So, there is evidently no shortage of children's books when it comes to matters of health.

While all of these resources could be considered great, there is one major flaw often in regards to film and TV, as well as fiction books; the portrayals of these illnesses or medical conditions could often be overly dramatized or almost glorified, and not give an accurate portrayal. For instance, medical dramas often turn up the drama and focus on either the worstcase scenario or the best-case miracle. Romantic movies can also glorify and romanticize the illnesses they portray, especially in the cases of *The Fault in Our Stars* (Boone, 2014) and *Five* Feet Apart (Baldoni, 2019), where the two main characters fall in love with people who have the same medical condition.

Another problem is that often minimal information about the various illnesses or medical conditions gets conveyed. For example, in A Million Little Things (Nash, 2018), one of the main characters had depression, and while it does get talked about and shows him going to a therapist and getting pills for his depression, unless the episode highlights that specific character, the fact that he even has depression is essentially ignored and this could be due to all of the other drama happening in the show. While this is fine for various shows to do because their focus is obviously on telling their story, if this is the only source students and children use to learn about these things, they are not getting the whole picture.

There is also a matter of opinion that one has to consider when looking at the news or nonfictional TV to get information related to health. Shows like *The Doctors* (McGraw, 2008) and The Dr. Oz Show (Oz, 2009) are hosted by people who do have their own opinions about medical matters, that made not be exactly the truth. The news also gets its information from

somewhere, and sometimes those sources aren't always true, whether they intentionally meant to lie or not.

These sources do have their flaws, but they could still be regarded as resources for introducing these topics and communicating with students about different illnesses and medical conditions. They may not be all fact, but they can be a good starting point for conversations about these topics. Also, the movies, television shows, and books listed above are by no means a comprehensive list of all the media on the subjects of illness, sickness, or medical conditions.

Teaching Health Through Media

There is a difference between just learning through media and being intentionally taught through media. This can be easily seen in the difference between a children's fictional book and a children's workbook. While they both have the ability to convey something, the workbook is more of a teaching tool. This can also be seen in the difference between the shows and movies listed above and children's educational programs. There are shows like *Mister Rogers*' Neighborhood (Rogers, 1968), Sesame Street (Cooney, 1969), and Bill Nye the Science Guy (Nye, 1993) that teach a different subject or lesson each episode. Now, these shows aren't necessarily related to health, however, Sesame Street did introduce a character with autism in 2017. There are also educational cartoons like Blue's Clues (Johnson, 1996), Little Einsteins (Weiner, 2005), and *Mickey Mouse Clubhouse* (Gannaway, 2006) that all engaged with the children watching the show and look to their "help" to solve the problems. These are all instances of teaching through media. So how does that translate to literature?

Comprehension

One has to consider children's comprehension when they are going to teach through media, and specifically through written media. McMunn Dooley (2010) looked at children's approaches to book through the emergence of comprehension. Dooley (2010) found in her study, of children ages 2 to 5 in the classroom and home settings, four main meanings and phases that children go through in relation to books: "Book as Prop," "Book as Invitation," "Book as Script," and "Book as Text" (p. 125). So, for literature, it may take a moment to fully teach a child something from a book or get them to grasp onto the words that are being said, but the idea of the concept does develop rather quickly making children's literature still very important for teaching about health.

Another study looked specifically at children's comprehension of illness (Bibace & Walsh, 1980). Through their study of three age groups of children (four-years-old, seven-yearsold, and eleven-years-old) they found three major types of explanation that the children understood and different levels of compression: prelogical explanations (which included explanations through phenomenon and contagiousness), concrete-logical explanations (which included explanations through contamination and internalization), and formal-logical explanations (which included explanations in physiological states and psychophysiological states) (Bibace & Walsh, 1980, pp. 913-915). This could help educators and authors target their writings and explanations of different illnesses towards specific comprehension levels. These would also be important to keep in mind when evaluating children's literature.

Theoretical Frameworks

Framing

One theory that could be applied here is framing theory. This theory was first introduced by Erving Goffman in his paper Frame Analysis (1974). He "assume[d] that definitions of a situation are built up in accordance with principles of organization which govern events—at least social ones—and our subjective involvement in them" and his use of the word frame was to refer to "these basic elements" that he was able to identify (Goffman, 1974, p. 10-11). Put another way, "framing theory suggests that how something is presented to the audience (called 'the frame') influences the choices people make about how to process that information" (Davie, 2014, para. 2). This theory is used in essentially every part of media: television, movies, the news, books, etc. When applied, writers use this theory to tell their story in a certain light, often to get a certain point across that the readers might not get from another "frame." This can be evidently used in children's literature like framing a story to make it happy, or fun, or serious, or framing an illness in a certain way as well.

Narrative Identity

Another theory that could be applied is narrative identity. Jonathan Adler (2012) defined narrative identity as "the internalized, evolving story of the self that each person crafts to provide his or her life with a sense of purpose and unity" (p. 367). One study calls it "the link between narration and the construction of identity for individuals" (Watson, Latter, & Bellew, 2015, p. 91). This same study used narrative identity to study how children, who had been adopted from the foster care system, viewed life storybooks used frequently in the foster care system and how those stories might contribute to their development of identity (Watson et al., 2015). While this is not directly related to health issues, the same thoughts of applying narrative identity could apply to this study.

Research Questions

The research questions used for this content analysis study are as follows:

RQ1: Do books about alopecia typically have a different frame than books about other medical conditions or illnesses, or vice versa? If so, what is that frame?

RO2: Is a frame of narrative identity more evident in books about alopecia over books about other medical conditions or illnesses, or vice versa?

RO3: Are books about alopecia more interactive than those that are about other medical conditions or illnesses, or vice versa? (This could come in the forms of a narrator that talks to the reader, questions that the reader has to answer while reading the book, or activities the book asks the reader has to perform).

Methods

This researcher used two model studies to help guide her study. The first is *Talking About* Maternal Breast Cancer With Young Children: A Content Analysis of Text in Children's Books published by Huang, Lee, Hu, Gao, and O'Connor in 2014 and the second is *Learning* Disabilities in Children's and Adolescent Literature: How Are Characters Portrayed? published by Mary Anne Prater in 2003. While the first study only looked at children's books about maternal cancer and this researcher wants to look at a broader spectrum of books, and the second only looked at learning disabilities and focused on the characters' portrayals and not on the overall frame of the books like this researcher wants, they still provided a great base to work off of in terms of how these researchers broke the books down into different analytical sections and classifications, how they classified the books, and in how they conducted their research.

A content analysis was employed to answer the research questions. This allowed for qualitative data from the children's books to be gathered and looked at in depth and in a systematic way (Elo, et al., 2014). The content analysis also provides the method for directly analyzing the content of the children's books in order to interpret their meanings which what is needed for analyzing how the authors chose to communicate their subject (Elo, et al., 2014).

The two theories as defined above were used as lenses to view the data. When the first theory, framing theory, is applied, writers use this theory to tell their story in a certain light, often to get a certain point across that the readers might not get from another "frame." This can be evidently used in children's literature like framing a story to make it happy, or fun, or serious, or framing a medical condition in a certain way as well whether as a means to make it simpler to comprehend or less scary. By using framing theory, comparing the books should be easier by viewing them through their frame, rather than trying to decide how well the books do at teaching their point. The second theory, narrative identity, was used as a frame itself. Children's books can often provide this sense of identity to children in relating to the characters or the situations in the books. However, a book like that would need to be written with this purpose in mind, so that is why this researcher used narrative identity as a frame to analyze the books through.

The other medical conditions in children's books that were compared to alopecia in this study are juvenile diabetes and children with special needs. These were chosen because they are often life-long conditions, like alopecia, and can also affect a child's mental and/or physical state throughout their lives, like alopecia (Myers, Johnson, & the Council on Children With Disabilities, 2007; Wolf & Baker, 2018; Wylie et al., 2019). The qualitative data was collected by reading the selected books, and some quantitative analysis was done in comparing the books.

Results

Children's literature can be used to connect with readers that have different medical conditions. This researcher looked at three specific medical conditions and saw how the authors

communicated about the different medical conditions to see how they are similar and how they are different. The following research questions were explored: 1) Do books about alopecia typically have a different frame than books about other medical conditions or illnesses, or vice versa? If so, what is that frame?; 2) Is a frame of narrative identity more evident in books about alopecia over books about other medical conditions or illnesses, or vice versa?; and 3) Are books about alopecia more interactive than those that are about other medical conditions or illnesses, or vice versa? (This could come in the forms of a narrator that talks to the reader, questions that the reader has to answer while reading the book, or activities the book asks the reader has to perform). These questions led to developing six different themes/classifications that were used to analyze the books: author, narrator, interactivity, plot, the character with the condition, and the medical condition. From these themes/classifications came 33 different aspects that the researcher decided to look at in order to answer the three main research questions. These are discussed in detail below.

Book Selection

Five books from each medical condition were selected. These were all found via Amazon.com through key word searches, including a combination of the medical condition and the words "children's books." Amazon was chosen for its convenience and easy access for buyers and to many different sellers, in addition to its wide range of products and decent pricing. Framing theory and narrative identity assisted in helping the researcher select the books that were analyzed. Framing theory is about how an author or creator portrays their work (Goffman, 1974; Davie, 2014). Authors and creators frame their works by focusing on a certain aspect like telling a story by focusing on the character or focusing on the location, etc (Goffman, 1974; Davie, 2014). Narrative identity is the idea that people create a sense of identity through

Table 1. The 33 Aspects

The 33 Aspects			
Author:	Character with the Condition:		
1) Was the book inspired because they have the	15) Gender		
condition?	16) Ethnicity		
2) Was the book inspired because they know	17) Human or animal portrayal?		
someone with the condition?	18) Main or secondary character?		
someone wan the condition.	19) Referred to as "different"?		
Narration:	20) Referred to as "special"?		
3) First person	21) Are they outcast from the other characters?		
4) Third person	22) Do they expereince a range of emotions?		
5) Parent/Adult perspective	23) Do they receive help?		
6) Child perspective	24) Do they give help?		
7) Is the narrator one of the characters?			
	The Medical Condition:		
Interactivity:	25) Which condition is represented?		
8) Does the narrator speak like they are having	26) Is it referred to as a "problem"?		
a conversation with the reader?	27) Is it referred to as a "struggle"?		
9) Does the narrrator ask the reader questions?	28) Is is portrayed in a negative or positive way?		
10) Does the book have activities for the reader	29) Are any physical implication of the condition		
to complete?	explained?		
	30) Are any mental implication of the condition		
Plot:	explained?		
11) Was the story based on real life?	31) Is it explained through narration/words?		
12) What is the underlying lesson (if there is one)?	32) Is it explained through images?		
13) Are adults or parents invovled?	33) Is it implied through the actions of the		
14) What is the tone?	characters?		

Note: This table shows the 33 aspects the researcher chose to use in the content analysis.

narratives, and so stories can become a part of people creating their identities (Adler, 2012; Watson, et al., 2015). All of the books chosen had the criteria of being picture books, meaning no chapter books were included, and having focus on a child with the medical condition, so no books about parents or adults having the medical conditions were included. These criteria were reached by looking at what kinds of children's books are out there before choosing the books. Focusing on picture books means the stories are often shorter and use the visuals as aids in telling their story. The researcher wanted to study these aspects because with the shorter stories often come a simple storyline and an underlying story which could be simpler to analyze the frame than a chapter book, and the reasoning for choosing picture books also tie to the reasoning for choosing books that focused on children have the medical condition. Children can see themselves reflected in books and identify with the characters more when the characters actually reflect themselves, so choosing books that depict children with the medical conditions in the story was important for considering the narrative identity framework, as well as in choosing picture books since children could often literally see themselves reflected in the images.

The following are the results from the content analysis. Tables 2 through 4 demonstrate the data collected from the books.

Author

Two questions were asked about the author: Was the book inspired because they have the medical condition, and/or was the book inspired because they know someone with the medical condition? These two questions were asked to get a better understanding of where the author is coming from in relation to the medical condition and if their story might be from a more personal understanding of the medical condition. For the alopecia books, two, *Happy As I Am* (Carrow, 2018) and *Who Are You?: Ella The Enchanted Princess* (Calafati, 2017), were inspired because

Alopecia Books Results

Col: Book Titles Row:Themes	Hair in my Brush	Happy As I Am	Heavenly Hair Ever After	My Hair Went on Vacation	Who Are You?: Ella the Enchanted Princess
author:					
Was the book inspired because they have the condition?	unknown	yes	no	no	yes, but not directly alopecia; the author lost her hair from chemotherapy treatments for breast cancer
Was the book inspired because they know someone with the condition?	unknown	no	yes	yes	no
narration:					
First person	no	no	yes	yes	no
Third person	yes	yes	no	no	yes
Parent/Adult perspective	no	no	no	no	no
Child perspective	yes	yes	yes	yes	yes
Is the narrator one of the characters?	no	no	yes, the character with the condition	yes, the character with the condition	no
interactivity:					
Does the narrator speak like they are having a conversation with the reader?	no	no	no	no	no
Does the narrrator ask the reader questions?	no	at the end of the book, after the plot is done	at the end of the book, after the plot is done	at the end of the book, after the plot is done	at the end of the book, after the plot is done as a means of teasing Ella's next adventures
Does the book have activities for the reader to complete?	no	no	yes, there were coloring pages	no	no
plot:					
Based on real life?	unknown	yes	no	yes	no
What is the underlying lesson (if there is one)?	Just because you look different from everyone else doesn't mean you can't do the same things as everyone else; just because you look different than before doesn't mean you aren't the same person; "You are beautiful. You are smart. You can do anything!" p. 12	Don't hide thing the things that make you stand out; "Actually, the things that make us unique are the things that are the most special about us, and that is okay. Be happy with who you are and others will be too." p. 19	Believing in yourself; everyone has a gift; "I am wonderfully and fearfully made. I will define what beauty means, not this world. No matter what my hair sutaiton is, I will always be-Me, My Beautiful Self!" p7	Self-love; "Bald kids need to feel self- love, not shame, for true beauty's within, shining bright like a flame" p. 16; "we are all unique" p. 20	Self-love; you are beautiful just the way you are; hair does not make you beautiful
Are adults or parents invovled?	yes; Briana's mother and teacher	no	yes; Celeste's mother and grandmothers	yes; Rosie's parents and teacher	yes; Ella's nanny
What is the tone?	positive, affirmative	positive, affirmative	positive, affirmative	positive, affirmative	positive, affirmative

Note: This table demonstrates the answers of the 33 questions in regards to alopecia books.

Table 2.

continued

Col: Book Titles Row:Themes	Hair in my Brush	Happy As I Am	Heavenly Hair Ever After	My Hair Went on Vacation	Who Are You?: Ella the Enchanted Princess		
character with condition:							
Gender	female	female	female	female	female		
Ethinicity	African American	Caucasian	African American	Caucasian	Caucasian		
Human or animal?	human	human	human (angel)	human	human		
Main or secondary character?	main	main	main	main	main		
Referred to as "different"?	yes	yes	yes	yes	yes		
Referred to as "special"?	no	yes	no	no	no		
Are they outcast from the other characters?	no	yes	no	no	yes; Ella cannot get past the talking mirrors until she shows her true self, so she cannot get to any other part of the castle until she goes through the hall of mirrors		
Do they experience a range of emotions?	yes	yes	yes	yes	yes		
Do they receive help?	yes; physical help and postive affirmations from her mother	no	yes; affirmations from her mother and grandmothers	yes; affirmations from her parents and the art scarves from her parents	yes; from her talking mirror, Molly		
Do they give help?	gives understanding of alopecia to her classmates	no	yes; she gives a little girl her hair back by using her gift	yes; her and her mother give art scarves to other bald kids	no		
medical condition:							
Which condition is represented	Alopecia	Alopecia	Alopecia	Alopecia	Alopecia		
Referred to as a problem?	no	no	no	no	no; the problem is actually not showing her bald head		
Referred to as a struggle?	no	not directly; her classmates realize it must have been "tough" and "difficult" for Annie	no	no	no		
Portrayed in a negative or positive way?	positive	positive	positive	positive	positive		
Are any physical implications of the condition explained?	yes	yes; at the end, after the plot	no	yes; at the end, after the plot	no		
Are any mental implications of the condition explained?	not directly; through the plot and narration, it is explained that Briana felt sad and not confident at first after losing her hair, but then it is later explained that she is no longer sad and that she believes the affirmations that her mother tells her	not directly; Annie experiences bullying because she looks diffierent and that makes her sad and causes her to stop wanting to do the things she loves	not directly; through the narration it explains at first, Celeste felt sad for having no hair	not directly; through the narration it is explained Rosie feels sad and her feelings get hurt by her classmates pointing and staring, and that she has to regain her confidence	not directly; through the plot and narration it is shown Ella does not have much confidence in her "natural" look at first and she had to gain that confidence		
Is the condition explained through narration/words?	yes	yes; at the end, after the plot	not directly; never mentions "alopecia" but does mention "hair loss"	yes	no; never mentions alopecia or hair loss directly		
Is the condition explained through images?	yes	yes	yes	yes	yes		
Is the condition implied through actions of the characters?	no	no	no	no	no		

Note: This table demonstrates the answers of the 33 questions in regards to alopecia books.

the authors had hair loss, two, Heavenly Hair Ever After (Payne, 2018) and My Hair Went On Vacation (Quinn, 2020), books were inspired because they knew someone with hair loss, and one, Hair In My Brush (Young & Ellis, 2018), was unknown. For the juvenile diabetes books, one, I'm Still Me, Can't You See? Diabetes Won't Stop Me (Hergenreter, 2016) was inspired because the author had diabetes, three, I Have Diabetes (Andersen, 2012), Taking Diabetes to School (Gosselin, 2004), and Year One with Type One (Suarez, 2018), were inspired because they knew someone with diabetes, and one, Caillou: Emma's Extra Snacks (Paradis, 2015) was unknown. For the physical special needs books, none were inspired because the authors had disabilities, two, Dear Jack (Wolfe, 2020) and My Brother Jeffrey (Britton & Britton-Ballas, 2020), were inspired because they knew someone with disabilities, and three, Don't Call Me Special (Thomas, 2002), Roxy the Racoon (Reeves, 2018), and Yes I Can!: A Girl and Her Wheelchair (Barrett, et al., et al., 2018), were unknown.

Narrator

Narration, for purposes of this study, is defined as the words the narrator (the person telling the story) uses and the style in which the narrator relays those words. The questions were as follows: Was the narration in the first person, was it in the third person, was it from a parent/adult's perspective, was it from a child's perspective, and/or is the narrator one of the characters? Asking these questions could help get a better understanding of the tone of the book and if the book might be more personable or relatable for readers. For the alopecia books, two, Carrow (2018) and Young & Ellis (2018), were in the first person, three, Calafati (2017), Payne (2018), and Quinn (2020), were in the third person, all five were from a child's perspective, and in only two, Payne (2018) and Quinn (2020), the narrator was one of the characters and specifically the character with the condition in both. For the juvenile diabetes books, three,

Col: Book Titles Row:Themes	Caillou: Emma's Extra Snacks	I Have Diabetes	I'm Still Me, Can't You See? Diabetes Won't Stop Me	Taking Diabetes to School	Year One with Type One
author:					
Was the book inspired because they have the condition?	unknown	no	yes	no	no
Was the book inspired because they know someone with the condition?	unknown	yes	no	yes	yes
narration:					
First person	no	yes	at the end	yes	yes
Third person	yes	no	the majority	no	no
Parent/Adult perspective	no	no	unspecifiable	no	no
Child perspective	yes	yes	at the end	yes	yes
Is the narrator one of the characters?	no	yes, the character with the condition	at the end	yes, one of the characters with the condition	yes, the character with the condition
interactivity:					
Does the narrator speak like they are having a conversation with the reader?	no	yes	no	yes	no
Does the narrrator ask the reader questions?	no	no	no	no	no
Does the book have activities for the reader to complete?	It has a tear-out poster in the back	no	no	there is a quiz at the end of the book	no
plot:					
Based on real life?	unknown	yes	yes	yes	yes
What is the underlying lesson (if there is one)?	Kids with diabetes can do all of the same things that all the other kids do, they just need to do extra things every day like eat extra snack and check their gluclose levels to help them function normally.	Children with diabetes bodies may work differently than the other kids, they "are just like all the other kids" p. 15	Diabetes may give you something different to deal with and may make you feel different to you or your friends and family, but you are still you; "Never let diabetes win!" p. 41	Kids with diabetes are just like everyone else, they just have to do some extra things to help their bodies function normally	"[Diabetes is] no easy, nor hard. It's just how I live. One key to it all is to stay positive." p. 33; You can do anything and be whoever you want to be even with diabetes
Are adults or parents invovled?	yes; the children's teacher	yes, Kindra's parents and doctors	no	yes; Jayson's parents and the school nurse	yes; Andrew's parents, doctors, and nurses
What is the tone?	postive, informative	positive, informative	positive, affirmative	positive; informative	positive; informative

Note: This table demonstrates the answers of the 33 questions in regards to juvenile diabetes books.

Table 3.

continued

Col: Book Titles Row:Themes	Caillou: Emma's Extra Snacks	I Have Diabetes	I'm Still Me, Can't You See? Diabetes Won't Stop Me	Taking Diabetes to School	Year One with Type One
character with condition:					
Gender	female	female	two females	one male, one female	male
Ethinicity	Asian	Caucasian	two Caucasians	two Caucasians	Caucasian
Human or animal?	human	human	human	human	human
Main or secondary character?	main	main	main	male main, female secondary	main
Referred to as "different"?	no	no	yes	yes	no
Referred to as "special"?	no	no	no	no	no
Are they outcast from the other characters?	no	no	no	no	no
Do they experience a range of emotions?	no	yes	yes	no, but Jayson says he can though it's not shown in the story	no
Do they receive help?	yes, extra help from Caillou, but Emma says it is not needed	yes	no	yes	yes
Do they give help?	yes, she gives understanding	no	no	no	no
medical condition:					
Which condition is represented	Diabetes	Diabetes	Diabetes	Diabetes	Diabetes
Referred to as a problem?	no	no	no	no	no
Referred to as a struggle?	no	no	yes	no	not directly, but reffered to as "work"
Portrayed in a negative or positive way?	positive	positive	positive	positive	positive
Are any physical implications of the condition explained?	yes	yes	not directly, implied	yes	yes
Are any mental implications of the condition explained?	yes	yes	not directly, implied	yes	not directly; talks about staying positive implying that it can be hard sometimes
Is the condition explained through narration/words?	yes	yes	not directly, implied	yes	yes
Is the condition explained through images?	yes	yes	no	yes	yes
Is the condition implied through actions of the characters?	no	yes	no	no	yes

Note: This table demonstrates the answers of the 33 questions in regards to juvenile diabetes books.

Andersen (2012), Gosselin (2004), and Suarez (2018), were in the first person, one, Hergenreter (2016), had the third person for the majority and first person at the end, four books, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018), were from a child's perspective, one, Hergenreter (2016), book had an unspecifiable perspective for the majority and a child's perspective at the end, in four books, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018), the narrator was one of the characters and specifically the character with the condition in all of them, and in one, Hergenreter (2016), the narrator was unspecifiable for the majority and at the end was a character with diabetes. For the physical special needs books, two, Britton & Britton-Ballas (2020) and Wolfe (2020), were in the first person, three, Barrett, et al. (2018), Reeves (2018), and Thomas (2002), were in the third person, two, Britton & Britton-Ballas (2020) and Wolfe (2020), were from a child's perspective, three, Barrett, et al. (2018), Reeves (2018), and Thomas (2002), were from an unspecifiable perspective, and in only two the narrator was one of the characters, one where it was the character with the condition and one where it was the character with the condition's sister, Wolfe (2020) and Britton & Britton-Ballas (2020), respectively.

Interactivity

Interactivity, for the purposes of this study, is defined as the level of interaction the narrator has with the reader and/or the level of interaction the book's activities has with the reader. The questions are as follows: Does the narrator speak like they are having a conversation with the reader, does the narrator ask the reader questions, and/or does the book have activities for the reader to complete? For the alopecia books, in none of the five did the narrator speak like they were having a conversation, in none of the five did the narrator ask questions during the plot, but in four of the books, Calafati (2017), Carrow (2018), Payne (2018), and Quinn (2020).

Physical Special Needs Books Results

Col: Book Titles Row:Themes	Dear Jack	Don't Call Me Special	My Brother Jeffrey	Roxy the Raccoon	Yes I Canl: A Girl and Her Wheelchair
author:					
Was the book inspired because they have the condition?	no	unknown	no	unknown	unknown
Was the book inspired because they know someone with the condition?	yes	unknown	yes	unknown	unknown
narration:					
First person	yes	no	yes	no	no
Third person	no	yes	no	yes	yes
Parent/Adult perspective	no	unspecifiable	no	unspecifiable	unspecifiable
Child perspective	yes	unspecifiable	yes	unspecifiable	unspecifiable
Is the narrator one of the characters?	yes, the character with the condition	no	yes, the character with the condition's sister	no	no
interactivity:					
Does the narrator speak like they are having a conversation with the reader?	yes	yes	yes	no	no
Does the narrrator ask the reader questions?	no	yes	no	at the end of the book, after the plot is done	at the end of the book, after the plot is done
Does the book have activities for the reader to complete?	no but it has a website kids can go to	just the questions the narrator asks	no	no	no
plot:					
Based on real life?	yes	unknown	yes	no	unknown
What is the underlying lesson (if there is one)?	Kids with diabilities can disrupt daily life, but they don't mean to; (This book creates sympathies for families that have children with disabilities)	You shouldn't make assumptions about people; many people with disabilities dislike being called special; people with disbilites are just like everyone else, but sometimes they may have extra equipment or people to help them; "We need to work and play together" p. 26.	Kids with diabilities can disrupt daily life, but they don't mean to; it can be difficult having a sibling with special needs, but they are still family and they love you; (This book creates sympathies for families that have children with disabilities)	It's more fun when everyone is included; no one should be excluded or left out because they have a disability	Kids with disabilites can do the same things other kids can and can still participate, though it may look different; kids should help other kids feel included and find ways to participate because it makes everyone feel good
Are adults or parents invovled?	yes; Holly's mom	yes; teachers and disability helpers	yes; Amy and Jeffrey's parents	no	yes; Carolyn's parents and teachers, and other adults
What is the tone?	positive; sympathetic	positive; informative	positive; sympathetic	positive, affirmative	positive, affirmative

Note: This table demonstrates the answers of the 33 questions in regards to physical special needs books.

Table 4.

continued

Col: Book Titles Row:Themes	Dear Jack	Don't Call Me Special	My Brother Jeffrey	Roxy the Raccoon	Yes I Canl: A Girl and Her Wheelchair
character with condition:					
Gender	female	multiple characters, multiple genders	male	female	female
Ethinicity	Caucasian	multiple characters, multiple ethinicities	Caucasian	species: raccoon	Caucasian
Human or animal?	human	human	human	animal	human
Main or secondary character?	main	no main character	main	main	main
Referred to as "different"?	yes	yes	yes	no	not directly; it is said that she has to do things differently because her legs don't work
Referred to as "special"?	yes	yes; though it says others may refer to them as special	yes	no	no
Are they outcast from the other characters?	not necessarily; but due to Holly, her brother is sometimes portrayed as outcast from doing all the things he likes or hanging out with the other kids	no	no	not on purpose; the characters realize Roxy is unintetionally being outcast and they make amends	no
Do they experience a range of emotions?	yes	yes	yes	yes	yes
Do they receive help?	yes	yes	yes	yes	yes
Do they give help?	no	no	no	helps give understanding of inclusion	yes
medical condition:					
Which condition is represented	Special Needs	Special Needs	Special Needs	Special Needs	Special Needs
Referred to as a problem?	no	no	no	no	no
Referred to as a struggle?	no; but it is implied as a struggle on the family	no	no; but it is implied as a struggle on the family	no	no; but some struggles Carolyn faces are described
Portrayed in a negative or positive way?	positive; but many negatives on the family unit as a cause of the condition are discussed	positive	positive; but many negatives on the family unit as a cause of the condition are discussed	positive	positive
Are any physical implications of the condition explained?	yes	yes	yes	not directly	yes
Are any mental implications of the condition explained?	yes	yes	yes	no	no
Is the condition explained through narration/words?	yes	yes	yes	no	yes
Is the condition explained through images?	yes	yes	yes	yes	yes
Is the condition implied through actions of the characters?	no	yes	yes	yes	yes

Note: This table demonstrates the answers of the 33 questions in regards to physical special needs books.

questions were asked after the plot, and in four, Calafati (2017), Carrow (2018), Quinn (2020), and Young & Ellis (2018), there were no activities, but in one, Payne (2018) there was a coloring page at the end. For the juvenile diabetes books, in only two, Andersen (2012) and Gosselin (2004), did the narrator speak like they were having a conversation, in none of the five did the narrator ask the reader questions, and in only two were there extra activities (one had a quiz at the end and one had a tear-out poster, Gosselin (2004) and Paradis (2015) respectively). For the physical special needs books, in only three, Britton & Britton-Ballas (2020), Wolfe (2020) and Thomas (2002), did the narrator speak like they were having a conversation, in only one book, Thomas (2002), did the narrator ask questions during the plot, but in two books, Barrett, et al. (2018) and Reeve (2018), questions were asked at the end, and only one book, Thomas (2002), had activities for the reader to do and that was through the questions asked during the plot, but one, Wolfe (2020), did have an additional website people could go to.

Plot

Four questions were asked about the plot: Is the story based on real-life events, what is the underlying lesson (if there is one), are adults or parents involved, and what is the tone? For the purposes of discussing the qualitative data more fully, the underlying lesson question will be discussed further down, after the quantitative questions. Also, the researcher found three main tones that the books fell into. The tone is what this researcher found as the approach the authors took when telling their plotlines. It is not quite the full frame of the books, but the tone does help create the frame. The tones were: 1) positive/affirmative, where the books took a positive approach to the medical condition and had a generally uplifting plotline as well as being uplifting to the reader; 2) positive/informative, where the books took a positive approach to the medical condition and were also informative on the subject of the medical condition; and 3)

positive/sympathetic, where the books took a positive approach to the medical condition but also discussed negatives that could be associated with the condition in a sympathetic way. For the alopecia books, two, Carrow (2018) and Quinn (2020), were based on real-life and one, Young & Ellis (2018) was unknown, in only four, Calafati (2017), Payne (2018), Quinn (2020), and Young & Ellis (2018) were adults or parents involved, and all five had a positive/affirmative tone. For the juvenile diabetes books, four, Andersen (2012), Gosselin (2004), Hergenreter (2016), and Suarez (2018) were based on real-life and one, Paradis (2015), was unknown, in only four, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018), were adults or parents involved, and four, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018), had positive/informative tones and one, Hergenreter (2016), had a positive/affirmative tone. For the physical special needs books, two, Britton & Britton-Ballas (2020) and Wolfe (2020), were based on real-life and two, Barrett, et al. (2018) and Thomas (2002), were unknown, in only four, Barrett, et al. (2018), Britton & Britton-Ballas (2020), Thomas (2002), and Wolfe (2020), were adults or parents involved, two, Britton & Britton-Ballas (2020) and Wolfe (2020), had a positive/sympathetic tone, two, Barrett, et al. (2018) and Reeves (2018), had a positive/affirmative tone, and one, Thomas (2002), had a positive/informative tone.

Underlying Lessons. The underlying lesson is important to look at because it helps shape the frame of the story. It can be a lens the authors use to guide their plotlines. For the alopecia books, the lessons were mostly about self-love and not letting hair loss define you or your beauty. They also were encouraging in embracing the difference they have because everyone is different. The lessons in the juvenile diabetes books mainly centered on the notion that kids with diabetes can still do all of the things regular kids do. They were also very explanatory, so they would explain the extra things the kids with diabetes have to do daily, but that they can still do

everything that the other kids do, and that they can still be whoever they want to be and be successful. The lessons in the physical special needs books varied the most between the five. For the two books that had the positive/sympathetic tones, their main lesson was that kids with disabilities can disrupt daily life, but they don't mean to and they still love and care for their families. The two books that had positive/affirmative tones were mainly about inclusion and how it's more fun when everyone is included, though it may look different or need different accommodations to make sure everyone can participate. The one book that had the positive/informative tone also focused on inclusion, but it took more of the approach of not making assumptions about kids with disabilities and that kids with disabilities are just like the other kids, though they might need extra help.

The Character with the Condition

Ten questions were asked about the character with the condition: what is their gender, what is their ethnicity, are they portrayed as a human or as an animal, are they a main or secondary character, are they referred to as "different," are they referred to as "special," are they outcast from the other characters, do they experience a range of emotions, do they receive help, and/or do they give help? These questions were derived from some basic distinctions the researcher wanted to look at quantitatively (in regards to the visual portrayals of the characters) and from wanting to see can kind of written portrayal was given of the characters. For the alopecia books, in all five the characters were females, in three, Calafati (2017), Carrow (2018), and Quinn (2020), the characters were Caucasian and in two, Payne (2018) and Young & Ellis (2018), the characters were African American, in all five the characters were humans, though one, Payne (2018) was also portrayed as an angel, in all five they are the main character, in all five they were referred to as different and in only one, Payne (2018), they were referred to as

special, in only two were the characters outcast, in all five the characters experienced a range of emotions, in four of the books, Calafati (2017), Payne (2018), Quinn (2020), and Young & Ellis (2018), they received help, and in three of the books, Payne (2018), Ouinn (2020), and Young & Ellis (2018), they give help. For the juvenile diabetes books, in three, Andersen (2012), Hergenreter (2016), and Paradis (2015), the characters were females, in one, Suarez (2018), the character was male, and in one, Gosselin (2004), there was one male and one female, in four, Andersen (2012), Gosselin (2004), Hergenreter (2016), and Suarez (2018), the characters were Caucasian, and in one, Paradis (2015), the character was Asian, in all five the characters were humans, in all five the characters were the main characters, though, in the one with one male and one female, Gosselin (2004), the female was a secondary character, in only two, Gosselin (2004) and Hergenreter (2016), of the books were they referred to as "different" and in none of the five were they referred to as "special," in none of the five were they outcast, in two, Andersen (2012) and Hergenreter (2016), of the books the characters experience a range of emotions, in four, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018) of the books the characters received help and in only one of the books, Paradis (2015), the character gives help. For the physical special needs books, in three, Reeves (2018), Thomas (2002), and Wolfe (2020), the characters were females, in one, Britton & Britton-Ballas (2020), the character was a male, and in one, Barrett, et al. (2018), there were multiple characters with different genders represented, in three, Barrett, et al. (2018), Britton & Britton-Ballas (2020), and Wolfe (2020), the characters were Caucasian, in the one with multiple characters, Thomas (2002), there were multiple ethnicities represented, in four, Barrett, et al. (2018), Britton & Britton-Ballas (2020), Thomas (2002), and Wolfe (2020), the characters were humans but in one, Reeves (2018), all the characters were animals, in four, Britton & Britton-Ballas (2020), Reeves (2018), Thomas

(2002), and Wolfe (2020), the characters were main characters and in the one with multiple characters, Barrett, et al. (2018), there is no one main character, in all five the characters are either referred to as "different" or are said they have to do things "differently," in only three, Britton & Britton-Ballas (2020), Thomas (2002), and Wolfe (2020), were the characters referred to as "special," in none of five were the characters outcast, though in one, Wolfe (2020), the character was outcast on accident but then later included, in all five the characters experience a range of emotions, in all five the characters receive help, and in only two, Barrett, et al. (2018) and Reeves (2018), do the characters give help.

The Medical Condition

Eight questions were asked about the medical condition, in addition to clarifying which condition was being represented: Is it referred to as a problem, is it referred to as a struggle, is it portrayed in a negative or positive way, are any physical implications of the condition explained, are any mental implications of the condition explained, is the condition explained through narration/words, is the condition explained through images, and is the condition implied through the actions of the characters? These questions were derived from wanting to look at the written portrayals of the medical conditions, to gather what kinds of tones were given, and to see how much detail was given on the medical conditions. For the alopecia books, in none of the five was in referred to as a problem, in only one, Carrow (2018), was the condition implied as a struggle by using phrasing around it being "tough" and "difficult," in all five it was portrayed positively, in only three, Carrow (2018), Quinn (2020), and Young & Ellis (2018), were physical implications explained, though two, Carrow (2018) and Quinn (2020), were after the plot was done, in none of the five were any mental implications explained, though they were hinted at through the characters either being sad or losing their confidence, in three of the books, Carrow

(2018), Quinn (2020), and Young & Ellis (2018), the condition was explained through narration/words, though one, Carrow (2018), was after the plot, in one, Calafati (2017), the alopecia is never directly mentioned though it does talk about hair loss (which is what alopecia is), in all five the condition is explained through images, and in none of the five is the condition implied through the actions of the characters. For the juvenile diabetes books, in none of the five is it referred to as a problem, in only one, Hergenreter (2016), is it referred to as a struggle and in one, Suarez (2018), it is implied as a struggle by using phrasing like it can be "work," in all five it is portrayed in a positive way, in four, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018), of the books physical implications are explained and in one, Hergenreter (2016), they are implied, in three, Andersen (2012), Gosselin (2004), and Paradis (2015), of the books mental implications are explained and in two, Hergenreter (2016) and Suarez (2018), they are implied, in four of the books, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018), the condition is explained through narration/words and in one, Hergenreter (2016), it is implied, in four of the books, Andersen (2012), Gosselin (2004), Paradis (2015), and Suarez (2018), the condition is explained through images, and in two, Andersen (2012) and Suarez (2018), the condition is implied through the actions of the characters. For the physical special needs books, in none of the five is it referred to as a problem, in none of the five is it referred to as a struggle, though in three of the books, Barrett, et al. (2018), Britton & Britton-Ballas (2020), and Wolfe (2020), the struggles families and the people with the condition can face are explained or implied, in all five it is portrayed in a positive way, though in two books, Britton & Britton-Ballas (2020) and Wolfe (2020), many negatives on the family unit are discussed, in four books, Barrett, et al. (2018), Britton & Britton-Ballas (2020), Thomas (2002), and Wolfe (2020), physical implications are explained and in one, Reeves (2018), it is implied, in three, Britton &

Britton-Ballas (2020), Thomas (2002), and Wolfe (2020) books mental implications are explained, in four of the books the condition is explained through narration/words, in all five books the condition is explained through images, and in four of the books, Barrett, et al. (2018), Britton & Britton-Ballas (2020), Reeves (2018), and Thomas (2002), the condition is implied through the actions of the characters.

Discussion

The purpose of this study was to see how children's book authors communicate about different medical conditions and to see if they are similar or different across a small variety of medical conditions. The following are the main findings that were found in relation to the three main research questions. How the 33 aspects assisted in answering the main research questions is broken down below by discussing which sections the aspects fell into (author, narration, interactivity, plot/underlying lesson, the character with the medical condition, and the medical condition) were used.

Frame

Do books about alopecia typically have a different frame than books about other medical conditions or illnesses, or vice versa? If so, what is that frame?

Theme of Inclusion. Configuring the books' frames mostly arose from looking at the answers in the sections of plot/underlying lesson, the character with the medical condition, and the medical condition. In the majority of each kind of book, the character with the medical condition underwent something through the plot that on the outside they could be seen as "different," though many of the book did not actually use that word, but the books would also most often come to some conclusion in their underlying lesson of embracing the differences

about yourself and/or embracing the differences others have. The medical conditions were often treated the same way and were all generally portrayed positively. The books generally gave the reader the idea that just because someone has something that makes them look or act differently than everyone else does not mean that they can't participate like everyone else. Thus, the books portrayed the medical conditions in positive lens of inclusion. This means that the frames of the books were focused on telling stories about inclusion. So, in this aspect, no, the alopecia books did not have a different frame than the other books. However, the alopecia books were the most affirming and encouraging books and centered a lot on self-love so the inclusion frame was a smaller part of these books than the others.

These books also do not share one of the flaws found in the resources in the literature review: the medical conditions are generally not over dramatized, glorified, or romanticized. The researcher found these books gave a fairly accurate portrayal of what it is like to live with these medical conditions on a daily basis, with the exception of some of the more fantastical plotlines of specifically the alopecia books like, *Heavenly Hair Ever After*, *My Hair Went on Vacation* (though the general plot/conclusion is fairly accurate of this one, but a lot of imagination is used), and *Who Are You? Ella the Enchanted Princess*.

Frame of Narrative Identity

Is a frame of narrative identity more evident in books about alopecia over books about other medical conditions or illnesses, or vice versa?

Self-Love and Personable. In looking at the frame of narrative identity, the researcher mainly focused on the answers from the sections of author, narrator, and plot/underlying lessons, as well as also considering the treatment of the character with the medical condition and the medical condition itself. The researcher found that the books where the authors had some

personal connection to the medical condition, the story was based on real life, and the narrator was also the character with the condition made for the most personable books, and so these books carried more of a frame of narrative identity. This can be seen because narrative identity is the story people craft in their heads to provide "a sense of purpose and unity" (Adler, 2012, p. 367) and that it also creates a "link between narration and the construction of identity" (Watson, et al., 2015), and so when the stories are more personable and easier to relate to the characters, it is easier to form a narrative identity.

And in also considering the books' underlying lessons, the books about alopecia were more generally about self-love than any of the other books, but they were not the most personable and also did not have the most evident frame of narrative identity. They really wanted readers to embrace their differences more personally than the other books, and it was easy to connect with the emotional struggles and confidence issues of the main characters, but only two of the stories were based fully on real life despite four of the five books having authors that had some personal connection to alopecia. The alopecia books also had the most fantastical storylines compared to the others, which does make it less realistic and less personable. The physical special needs books were a mixed bag, with two of them coming off as more sympathetic than just personable, one of them being informative, and two of them being more affirmative like the alopecia books. They did not carry a big frame of narrative identity, and were the least personable with only two of the books knowingly having authors who had a personal connection to the medical condition and being based on real life. The juvenile diabetes books came across as the most personable and also had the most evident frame of narrative identity due to the narrator in all of them being the main character with the condition and having four of the five being based on real life. These also happened to be the most informational books in that they often described

the daily habits and movements of a child with diabetes so children who have diabetes could easily see themselves in and related to the characters as they would most likely be doing the same things.

Also, because of the informational aspects of the diabetes books, they were the only ones generally that did not struggle with the other main flaw found in the resources of the literature review: they did not provide the minimal amount of information (with the exception of the one book which had the positive/affirmative tone, I'm Still Me, Can't You See? Diabetes Won't Stop Me). The juvenile diabetes books went into detail of a the daily lives that a child with diabetes might have as well as most of them explaining some of the details of the equipment used and how diabetes can affect a child's physical and mental state. The physical special needs books also had one book with the positive/informative tone that explained some of the daily life happenings of a child with special needs, Don't Call Me Special, but also due to the nature of broadness in the physical special needs category, the books in general did give minimal information. The alopecia books did fall into the flaw of giving minimal information as a couple of the books did not even mention the word "alopecia" but just talked about losing your hair and being bald. This could imply that perhaps authors of physical special needs and alopecia children's books could strive for providing more information about the medical condition in the books to help readers better understand the medical condition.

Interactivity

Are books about alopecia more interactive than those that are about other medical conditions or illnesses, or vice versa?

Physical Special Needs and Interaction. The books about alopecia were not the most interactive ones. The books about physical special needs were the most interactive based on they had the most books where the narrator spoke like they were having a conversation with the reader (three of five), the narrator asked the reader questions (three of five), and had activities for the reader to complete (one of five, but another one also had a website for readers to go to). The physical special needs books also had the only book that checked off all three boxes for interactivity, *Don't Call Me Special*, which also happened to be the book with the positive/informative tone.

Conclusion

This research was started due to a personal connection the researcher had with alopecia. The researcher did not seek out resources like children's books to help her understand her condition, help her embrace it, or show her others like herself, so she wanted to see what sort of resources are out there for children now who might struggle with a medical condition. While many children's books are and could be considered educational, what is at their core though is how they have chosen to communicate their subject and communication can be key for getting a story or a lesson across the right way for a child to understand.

So, with the personal connection to alopecia, this researcher wanted to see how children's book authors are communicating about the subject and to see if it was communicated differently than other medical conditions or if most authors all take the same approach. This research is also meant to help other children's book authors to easily see how others are doing it and to perhaps cross-examine their own work to see if there is a better way to communicate their subject. With theories like framing and narrative identity, it is easy to classify the communication taking place and cross-examine.

Practical Implications

There is no shortage of current media out there that talks about various illnesses and medical conditions. It ranges from movies to children's books, and there is something for every age. Now, whether or not someone could get the whole picture of or fully understand an illness, disease, or medical condition from some of these mediums can be up for debate.

Communicating a subject to children really boils down to making sure things are being comprehended at the right levels. Children understand things differently than older kids and adults do, and writers and educators need to cater to their needs. If someone wants to tell a child about an illness or medical condition, they need to be prepared to use appropriate language and examples to make sure they are explaining at the right comprehension level.

Most of the authors in this study focused on some aspect of communicating the idea of inclusion and that though other children might look or act "differently" than "normal," they are still just like everyone else. This can be used to communicate ideas not only for the children who have the medical conditions but also for those who do not have the conditions. For children who might feel different from others because of their medical condition, they can use the narrative to identify themselves in the story and feel a sense of belonging and not being outcast for being different. For children who might see others as different from themselves because these other children might have a medical condition, inclusion is an important lesson in life, and in learning that yes, everyone is different, but they are all still kids that can all play together.

For children's literature authors who write about medical conditions, this researcher would suggest creating stories that are personable and more informational. Communicating more about the technicalities of the medical conditions makes the ideas less foreign to readers, and also makes them more personable and relatable. Also, to make it even more personable, this

researcher would suggest that if the authors don't have any personal connection to the medical condition, to talk with those who do and share their stories. Communicating about real-life people may not always be the most fantastical or imaginative for kids, but they become stories that can be more relatable and easier for children to connect and identify with.

The Researcher's Children's Book

The researcher used these practical implications to aid in their writing of a children's book about alopecia. In an effort to make it personable and use a frame of narrative identity, the researcher used their own story with alopecia to write the plot. The researcher also used herself as the narrator and wrote in first person like how the juvenile diabetes books used the character with the condition as the narrator and how most of them wrote in first person. The researcher chose to follow the leads of the juvenile diabetes authors in order to carry a frame of narrative identity. The researcher used a duel tone of positive/affirmative and positive/informative as most of the books used one of those two tones. The researcher wanted to combine the two tones for encouraging the reader and leaning towards that frame of inclusion while also making the concept of alopecia less foreign and more comprehendible for children. The researcher felt that what the alopecia books lacked most was information on the medical condition and this researcher did not want to have that problem. At the beginning of the book, the researcher gave information on what alopecia was and how it affects people physically. The readers could also infer some of the mental and emotional affects alopecia could have on a person through the plot of the story. In bringing in the positive/affirmative tone, the researcher wrote towards that selflove aspect that the alopecia books did cover well. The researcher aimed to achieve what the physical special needs books did with interactivity. In the researcher's story, the narrator speaks like she is having a conversation with the reader and does ask the reader questions. There are not

any activities for the reader to complete, but the ending does pose a question that the reader could think and act on in their lives. The researcher also followed along the same frame as the other authors and wrote towards a theme of inclusion. The researcher encouraged the readers to embrace their differences and embrace the differences of others, like the other children's authors in this study also did.

Limitations and Future Study Directions

In first going back to the literature review, it was difficult finding papers or studies that talked about teaching or communicating about medical conditions. Often what came up were different case studies about any given medical condition or something that was laden with medical terms and not relevant to this study. Now, there were the two studies that discussed a content analysis of children's books on maternal breast cancer (Huang, Lee, Hu, Gao, & O'Connor, 2014) and the portrayal of characters with disabilities in children's books (Prater, 2003), respectively, and they did discuss some learning/teaching traits that they found in the books. However, those were mainly content analysis studies that did not really look at the impacts the books could or do have on children, and did not evaluate how "good" the books were or how "well" they communicated their subject.

For this study, the approach of a content analysis did prove appropriate for answering the research questions. However, for future studies, the researcher would recommend either more than one researcher looking at the source material to get more than one person's thoughts and observations and/or getting the thoughts and opinions of children, who are the target audience of the books, to see what they think of the lessons and what they get out of the stories. The researcher would also like to point out that in the character representation of the stories, the

majority of the characters were Caucasian and female. Due to the focus on the words of the books and not the pictures, this was not really considered in how this could affect a reader's ability to identify with the characters. So, for future studies, it might also be helpful to take the visuals more into account and ask more questions that rely on analyzing the visuals.

There were also a couple of flaws in selecting the books that were analyzed. Firstly, in searching for "alopecia children's books," books came up and were selected that were not specifically about alopecia, but just generally about hair loss. While they are the same thing in a practical sense, they still aren't specifically about alopecia, which is what the researcher wanted to study. Secondly, one of the books originally selected in the juvenile diabetes books proved to be more of a small chapter book with pictures, rather than a picture book. So, the researcher had to pick another book. Paying closer attention to the page number listed on Amazon, or looking for an average children's book page number first could have potentially prevented this mistake.

The scope of the research was also fairly small. Only three medical conditions were considered and only five books of each were looked at. There are obviously more than three medical conditions in the world that affect children and comparing and cross-analyzing a larger sample could result in some interesting discoveries. Perhaps even comparing a larger sample size of books about alopecia, juvenile diabetes, and physical specials needs could introduce different factors not considered or seen in this study. Given the chance to do the study again, this researcher would like to look at more than three medical conditions and perhaps do some more cross-comparison between the themes and frames most evident in books about typically non-fatal medical conditions compared to more fatal medical conditions, since this study was on mainly non-fatal, life-long conditions. It could be interesting to see if one set comes off as more serious or more light-hearted than the other.

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