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## Speech-Language Pathology Students' Perspective of Working with Older Adults

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**Speech-Language Pathology Students' Perspective of Working with Older Adults**

Anna Hamill

Williams Honors College Research Project

Spring 2023

The University of Akron

### **Abstract**

There is an increasing demand for speech language pathologists (SLPs) willing to work with older adults. Demographic trends warn that the number of people over 65 will double by 2050 (Vincent, 2010). Studies reveal that only 37.3% of SLP students prefer to work with older adults after graduation (Leonard et al., 2016). Ageism is affecting speech-language pathology and related health care professions. Research within the last five years has shown that ageism towards older adults exists across multiple medical professions in all fields and settings (Heape et al., 2020). Interdisciplinary fields report negative feelings towards older adults (Ortiz-Rubio et al., 2020). Medical and nursing students have identified negative attitudes surrounding stereotypes and complex illnesses as barriers preventing them from pursuing work with older adults (Fisher et al., 2022). The purposes of this study were twofold: (1) to examine existing literature on SLP and interdisciplinary health profession students' preferences and attitudes towards working with older adults and (2) to develop a survey instrument to identify barriers preventing SLP students from working with older adults. The survey instrument was developed to identify any changes in students' perceptions of working with older adults that may occur between undergraduate and graduate school; how students' previous interactions and experiences with older adults relate to their attitudes of working with older adults in the future; how pre-existing attitudes toward older adults influence employment preferences of speech-language pathology students; if speech language pathology students' attitudes and experiences are similar to students in other health care professions (e.g., nursing); and if there is a relationship between courses related to aging and older adults and student preference for age of patient population. A twenty-eight-question survey was developed to examine attitudes and barriers to students' decisions to work with the older adult populations. This survey has the potential to supplement the existing literature to identify if the field will be able to meet the demand for SLPs willing to

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treat older adults. Application of this survey in practice may reveal information that contributes to students' decisions regarding population preference and will provide insight to create recommendations for SLP programs to ensure they provide students with appropriate opportunities to foster and maintain the willingness to treat older adults.

### **Speech-Language Pathology Students' Perspective of Working with Older Adults**

With the human population currently inhabiting the globe reaching eight billion, the aging population has managed to skyrocket, with professionals expecting rapid growth in the older population (Vincent, 2010). By the year 2030, one in five U.S residents will be 65 years old or older according to the U.S. Census Bureau (Vincent, 2010). The number of residents in this age group will double from the year 2010, up to a projected 88.5 million residents by 2050 (Vincent, 2010). The Bureau reported that the number of those aged 85 years and older is projected to reach 19 million residents by 2050 and is comprised largely of the aging baby boomer demographic (Vincent, 2010). United States residents are living longer as evidenced by the shift in the leading cause of death, from previously infectious diseases and acute illnesses to chronic diseases and degenerative illnesses (Darling, 2016).

As the number of older adults increases there is a greater demand for speech language pathologists (SLP) to treat age-associated speech, language, swallowing and cognitive difficulties (American Speech, n.d). Speech-language pathologists will increasingly see the number of older adults increase on their caseloads as older adults are more likely to present with hearing, speech and language, or cognitive difficulties (Darling, 2016). These statistics foreshadow the need for more competent speech-language pathologists willing to treat and provide services to the aging generation to ensure they receive adequate treatment for their communication-related difficulties (Darling, 2016). To attract more prospective graduates to enter the field with a desire to treat older adults, barriers and factors that inhibit students from pursuing this population must be identified (Fisher et al., 2022).

## Literature Review

### Current Employment Trends and Statistics

According to the American Speech-Language-Hearing Association (ASHA), the older population is expanding and increasing in demand (American Speech, n.d). Importantly, as the number of older adults exponentially grows, the number of speech pathologists entering the field has also increased in recent years. ASHA released updated member and affiliation counts, providing current employment trends for speech-language pathologists. The number of current ASHA members and affiliates increased from 105,339 in 2001 to 223,456 in 2021 (ASHA Member, 2021). Of these members and affiliates, 50.9% of speech-language pathologists were working in a school setting, and 39.4% working in health care facilities (e.g., including hospitals, residential health care facilities, nonresidential health care facilities (ASHA Member, 2021). ASHA did not report on speech-language pathologists working in colleges/universities and “other” settings. The updated employment statistics showed that SLPs working in school settings fell slightly but hospital settings saw a 2.6% increase in employment (ASHA Member, 2021). Trends reveal a 116.9% increase over twenty years in ASHA-certified speech-language pathologists (ASHA Member, 2021). This increase in SLPs provides an opportunity for newly licensed SLPs to enter the field and care for the aging generation. As more SLPs are entering the field, it provides hope that, of those entering, a portion of SLPs will desire to work with older adults and meet the increasing demand.

The Bureau of Labor Statistics (BLS) additionally provides employment statistics as of 2021 (Bureau of, n.d). The BLS found that of the 159,800 jobs held by speech-language pathologists, schools provided 40% of jobs; offices of physical, occupational and speech therapists, and audiologists provided 24% of jobs; hospitals, state, local, and private provided

14% of jobs; 6% of SLPs were self-employed; and 4% worked in nursing and residential care facilities (Bureau of, n.d). Although there are some discrepancies between ASHA and BLS, they indicate that there are higher percentages of speech-language pathologists employed and working in school-based settings opposed to hospital facilities.

### ***Population Preferences in Speech-Language Pathology Students***

Despite the shifting demographics of patient populations served by speech-language pathologists, there is currently a lack of research on patient population preferences of speech-language pathology students. One previous study by Leonard et al. (2016) investigated the preferences of students to discern where the field may be growing in the future. The authors suggest that the identification of student preferences towards employment settings may indicate a need to reconfigure and modify the instruction that students receive about professional topics and provide counseling for career opportunities (Leonard et al., 2016). To investigate this claim, Leonard et al. (2016) developed and distributed a questionnaire to undergraduate and graduate students to unveil current vocational preferences. The questionnaire examined the satisfaction levels, along with age and facility preferences.

When examining the results of the questionnaire Leonard et al. (2016) found that 62.7% of students wished to serve children and 37.3% of students wished to work with adults. Of the students who wished to work with children, 50.3% hoped to work with primary school-aged students, 41% were interested in early intervention, and only 8.7% preferred to work with secondary school-aged students. Leonard et al. (2016) also recorded the level of decidedness on students' chosen age preference. Of the students who answered the decidedness questions, 52.4% of students were somewhat decided, 22.6% were somewhat undecided, and 8.2% were undecided on age preference (Leonard et al., 2016).

*Setting Preferences in Speech-Language Pathology Students*

Leonard et al. (2016) also investigated setting preference among students and its relationship to students' academic level. The students indicated facility preferences based on the age of desired population (Leonard et al., 2016). Students who indicated they want to work in early intervention populations seemed to prefer working in hospitals (61.3%) in comparison to working in schools (37.3%) (Leonard et al., 2016). In addition, the researchers found undergraduate students more often preferred to work in a health care setting while graduate students desired to work in schools (Leonard et al., 2016).

Regarding the 37.3% of students who indicated a preference for working with adults, 48.6% preferred rehabilitation settings, acute care hospitals followed with 22.9%, skilled nursing held 13.8% preference, outpatient clinic/office was preferred by 9.2% of students, and home health held the least amount of interest with only 3.7% of students selecting preference for home health populations (Leonard et al., 2016). Leonard et al. (2016) reported that when age preference of patient population is negated, most students (65.8%) preferred to work in health care settings when compared to school-based settings which received only 33.2% preference.

Furthermore, reports reveal geriatricians are limited in the United States (Heape et al., 2020). Geriatric medicine training programs are scarce and resulting in a decrease in the availability of specialty services for older adults (Heape et al., 2020). The limited access to specialty services decreases the opportunities for older people to reach and maintain their health potential (Heape et al., 2020). Heape et al. (2020) reference an investigation of medical students where results show students do not express interest in specializing in geriatric medicine. It is thought increased documentation, workload, and declining reimbursement rates are factors preventing students from entering geriatric specialties (Heape et al., 2020).



### **Influential Factors on Attitudes Towards Older Adults**

Prior studies suggest that college students' perception of older adults and aging overall is negative and stereotypical (Fisher et al., 2022). Fisher et al. (2022) reported that students responded describing older adults as grumpy, mean, stubborn, difficult to care for, and requiring extra time to care for physical and mental decline. This consensus was found to be true especially in students who have less experience and contact with older adults (Fisher et al., 2022). Such findings support the need to conduct more research regarding perceptions towards geriatric patients across interdisciplinary health care professions.

### ***Lack of knowledge and Interest on Aging***

#### **Communication Science Disorders Students**

In response to the lack of studies on communication science disorders (CSD) students' knowledge about aging and attitudes towards older adults, Darling (2016) conducted research via survey, direct, and indirect measures to gain information on this issue. Senior level undergraduate CSD major students at a medium-sized public university were provided a packet of study materials and completed a survey about their level of knowledge about aging and older adults, level of knowledge about communication disorders in older adults, general experience working with older adults, and number of nonwork-related interactions with older adults (Darling, 2016). The Facts on Aging Quiz (FAQ) was utilized to examine what knowledge the students had regarding aging and the aging process (Darling, 2016). FAQ covers physical, cognitive, and social areas of aging, in addition to common misconceptions about the aging process (Darling, 2016). In addition, the Polizzi's Attitudes Toward the Elderly Scale (PATES) was utilized to evaluate attitudes towards older adults and consists of 24 bipolar adjective pairs

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that describe attributes or characteristics of older adults (Darling, 2016). Student-generated drawings and legend text analysis were also performed to analyze students' perception of aging by having them draw a picture of an older adult and a depiction of themselves when they reach older adult age (Darling, 2016).

When examining students' knowledge of aging, results from the Darling (2016) study revealed that few students have taken a gerontology-related course. Of the students surveyed in this study, it was found that on average, only two CSD-major classes had information covering the aging process and how it relates to communication disorders. It was reported that 52.4% of students had little knowledge about aging and older adults, with only 37.1% of students reporting some level of knowledge (Darling, 2016). Most students surveyed reported that they had some level of knowledge regarding communication disorders in older adults (57%), and 34.5% reported to have minimal knowledge (Darling, 2016). Non-work-related interactions with older adults ranged from none to some experiences (Darling, 2016). Within those ranges, 8.3% of students reported no interactions with older adults, 33.1% reported minimal interactions, and 45.5% reported some interactions with older adults (Darling, 2016). Darling (2016) gave students revised versions of the FAQ1 and FAQ2 with multiple choice question formatting rather than true/false formatting to reduce the possibility of students guessing the correct answer. Students' scores on the FAQ1 and FAQ2 were 35% and 30% correct, respectively (Darling, 2016). These results indicate that undergraduate CSD students in the study had limited knowledge related to aging (Darling, 2016). PATES results indicated a positive attitude towards older adults for both male and female participants (Darling, 2016). When analyzing participants' student-generated drawings, researchers discovered that the self-portrait of students contained more smiles, less frowns, involvement with other people, engagement in physical activities, and

a location that was homelike opposed to a care facility compared to student-generated drawings of older adults (Darling, 2016).

### **Interdisciplinary Health Professions Students**

Previous research in other health-related fields has also examined students' perceptions of working with older adults. A study conducted out of Spain carried out a cross-sectional analysis among nursing students utilizing Kogan's Attitude Toward Old People Scale to assess students' opinions about older adults (López-Hernández et al., 2021). To supplement the data from Kogan's scale, students were also asked their age and sex, if they studied nursing with older adults in mind, if they completed a clinical placement in nursing homes or hospitals, the type of contact they have had with older adults, and if they would consider working with older adults once they enter the field (López-Hernández et al., 2021). The study's results showed that 20.2% of students were over the age of 25, 28.4% of the students had completed their clinical experience in nursing homes or hospitals, and 24.1% of the participants had taken a course on caring for older adults (López-Hernández et al., 2021). Regarding contact with older adults, 48% of participants reported that their previous experience was with older adults at home (López-Hernández et al., 2021). In response to participants' desire to work with older adults in the future, only 30.2% reported interest (López-Hernández et al., 2021).

Participants that were assessed through Kogan's score indicated positive attitudes towards older adults with female students scoring higher positive attitudes than male students (López-Hernández et al., 2021). Results indicated, but were not statistically significant, that those over 25 years of age have more negative attitudes towards older adults (López-Hernández et al., 2021). The researchers caution that this conclusion may be a result of cultural differences and suggest further research is needed (López-Hernández et al., 2021).

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The findings by López-Hernández et al. (2021) were supported by existing literature from Dahlke et al. (2020) on the notion that clinical experiences with older adults affect students' attitudes towards the population (López-Hernández et al., 2021). López-Hernández et al. (2021) conducted a study with nursing students and found that previous experiences with older adults had more of an impact than clinical rotations on their perception of older adults. López-Hernández et al. (2021) discovered that previous experiences working with older adults in facilities resulted in more negative attitudes towards this population; however, attitudes improved after positive experiences with older community adults and older relatives (López-Hernández et al., 2021). Similarly, Dahlke et al. (2020) found that nursing school students and faculty at a Canadian university faculty had negative perceptions of older adults which were related to previous experiences with older adults and experiences in long-term care clinical placements.

Dahlke et al. (2020) determined lack of educational focus on older adult populations in coursework, inaccurate portrayal of dependency, little instruction on the complexity of care older adults require, previous experiences, social perceptions, and negative views towards older adults from clinical instructors to be themes preventing nursing students from pursuing work with older adults in the future. Similarly, López-Hernández et al. (2021) found impactful factors on the perceptions of older adults were sex, older adult related coursework, and previous personal experiences with older adults.

A study by Chen et al. (2011) examined the impact of a *Geriatric Medication Game* on the perceptions and attitudes toward older adults and common disabilities that impact older adults. Students assumed a role as an older adult and were given age-related impairments (e.g., poor vision or mobility) to act as patients in simulated healthcare scenarios (Chen et al., 2011).

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Following the interactive scenario, students were asked to fill out reflections about their experiences and how they changed their perceptions of older adults (Chen et al., 2011). Relevant questions regarding attitudes towards older adults included: “What did you learn about the elder experience from playing this game; Has your attitude towards elderly patients changed from playing the game? How?” (Chen et al., 2011, p. 3). Results from this study’s analysis of students’ experiences revealed seven different themes. Themes included that students felt frustrated while playing this game; experienced frustration and other emotions for various reasons including loss of ability, difficulty completing tasks, and having to wait for services; learned that disabilities make it difficult for older people to complete tasks; had improved attitudes towards older adults following the simulation; felt that their attitude had changed because they had gained awareness and understanding of the experience of older adults; learned more about the United States healthcare system; planned on making positive changes in their future practice setting by being more patient and understanding (Chen et al., 2011).

The results by Chen et al. (2011) found a positive change in attitudes towards older adults following completion of an aging-related simulation game. Chen et al. (2011) discovered that students and professionals who already work with older adults are more likely to have positive attitudes towards older adults. Students engaging in increased interactions with older adults through family members or clinical experiences indicated increased positive attitudes prior to the experiences conducted in the study (Chen et al., 2011). From these results, Chen et al. (2011) suggests that spending time with older adults may help students to learn about this population and diminish any existing stereotypes or biases regarding older adults. Furthermore, the authors suggest that working with older adults can show that existing stereotypes are not representative of all older adults. As a result of Chen et al. (2011) and the intervention conducted in the study,

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students reported that they anticipate adjusting their future practice to be more patient, anticipate providing more assistance, being more understanding towards older adults, and increasing the amount of time spent counseling.

### **Ageism**

Negative attitudes and behaviors towards a population based on age alone is referred to as ageism (Gallo, 2019). Behaviors such as speaking down to older adults and/or providing unequal care to older adults because of age are considered ageist (Gallo, 2019). Ageism is one of the most prevalent forms of stereotyping, prejudice, and discrimination and is seen as an increasingly important public health issue (Ayalon et al., 2019). This animosity can be subjected to any age group, although older adults have been found to be the most susceptible and at risk of suffering negative consequences (Ayalon et al., 2019). Ageism is comprised of discrimination, prejudice, and stereotypes that are directed at others or oneself and can be delivered explicitly or implicitly (Ayalon et al., 2019). Ageism has physical implications on one's health including cognitive and functional performance, poorer mental health, increased morbidity, shorter lifespan, and poorer recovery from disability (Ayalon et al., 2019). Feelings of distress and isolation can cause older adults to withdraw from their meaningful roles in society (Ayalon et al., 2019). Importantly, Heape et al. (2020) revealed that ageism spans across multiple disciplines in the medical community, with no health care profession or setting being exempt from existing literature regarding bias against older people.

### **Ageism in Speech-Language Pathology Students**

Cultural competency standards are required for graduate level programs by the Council on Academic Accreditation in Audiology and Speech-Language Pathology (Heape et al., 2020).

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According to Heape et al. (2020), under these standards, age is recognized as a cultural variable which demands more than superficial awareness of a culture. These authors also explain that cultural competency includes skills, encounters, and desires which culminate in a dedication to continuously learn and evolve.

Heape et al. (2020) reported that from the small pool of literature on ageism in speech-language pathology, it is prevalent in some SLPs. It was found that there is a noticeable gap in knowledge of aging between practicing SLPs and other interdisciplinary graduate level medical professionals (Heape et al., 2020). Heape et al. (2020) attributes this discrepancy to SLP graduate students having potentially lower expectations of the language abilities of older adults.

Importantly, studies revealed that older adults who reported discrimination during their stay in health care settings experienced a worsening of their disability more often than older adults who did not report discrimination (Heape et al., 2020). Heape et al. (2020) propose that quality care for older adults might be impacted by the societal perception of working with older people. Heape et al. (2020) suggest that professionals in health care are equally likely to discriminate against older people as the public. Ageism might skew the provider's perception of conditions which are a result of normal aging and cause the patient to be over or under treated (Fisher et al., 2022).

Patronizing speech towards older adults is referred to as elderspeak (Heape et al., 2020). This is often implemented by health care professionals especially when interacting with residents who present with cognitive impairments (Heape et al., 2020). Elderspeak includes the use of baby talk, terms of endearment, patronizing use of "we," questions used to restrict conversation and control answers, suggestions the client will participate in an activity "for me" (Heape et al.,

2020). Ageism and negative outlooks are tied to chronic disease, poor experiences with health care, declining physical health and increased mortality in patients (Heape et al., 2020).

To examine ageism in graduate speech-language pathology students, Heape et al. (2020) administered the Fraboni Scale of Ageism (FSA) to SLP graduate students. The results showed that male students were less ageist than female students, and previous experiences with older adults were an influential factor on scores (Heape et al., 2020). Heape et al. (2020) reported that variables such as life experiences, parents over 65 years of age, and one having age-related issues have implications on scores.

### **Ageism in Interdisciplinary Health Professions Students**

Current research in the speech-language pathology field on ageism is lacking. Existing research focuses on students and professionals in interdisciplinary health care (fields of nursing, pharmacy, medicine, and social work) regarding ageism, attitudes, and knowledge about aging (Darling, 2016).

The attitudes of young professionals and students are important to evaluate because they will be providing care for the fast-growing older adult population (Ortiz-Rubio et al., 2020). Past studies analyzed students, professors, and society on perceptions, stereotypes, and attitudes towards older adults. Results revealed negative, discriminative, and judgmental attitudes exist towards older adults (Chen et al., 2011; Gallo, 2019; & Ortiz-Rubio et al., 2020). In contrast, other studies, such as Darling (2016), revealed positive attitudes regarding the abilities of older adults, the aging process, and older adults in general. Researchers propose that this change towards more positive conceptions of older adults may be due to curriculum changes in many



universities that incorporate geriatric-specific education into required and elective courses (Darling, 2016).

Ageist behaviors such as talking down to older adults, speaking louder to older adults, and stereotyping what an older adult should look like has been reported amongst nursing students (Gallo, 2019). A review of literature about nursing education and ageism revealed that as students age, their attitude towards older adults becomes more positive (Gallo, 2019). Gender was also examined, and it was determined that males were more confident than females when working with older adults (Gallo, 2019). Studies within the review found that increased experiences treating older adults yielded negative implicit attitudes towards older adults and that student nurses had more positive attitudes than working nurses (Gallo, 2019). In addition, it was found that health care profession students' confidence and interest in working with older adults was related to frequency of contact and the perception of rewarding experiences with older adults (Gallo, 2019).

In another study to examine students' perceptions of aging and older adults, students from eight different health care professions were assessed using the Geriatric Attitudes Scale (Fisher et al., 2022). Those students were in dietetics, medicine, nursing, pharmacy, physician assistant, physical therapy, social work, and speech-language pathology programs (Fisher et al., 2022). With most research on this topic being within medical and nursing professions, this study offers a unique perspective into how other professions see this public health issue (Fisher et al., 2022). Fisher et al. (2021) developed qualitative survey questions to supplement quantitative questions derived from the University of California at Los Angeles Geriatrics Attitudes Scale (GAS). The additional qualitative survey portion aimed to explore exposure to others'

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perceptions and actions towards older adults to understand how potential influences affect intentions and behaviors of the students (Fisher et al., 2022).

Relevant results found that 70.3% of respondents were female, white students pursuing graduate education (80.3%) with 69.4% having previous work or volunteering experience with older adults (Fisher et al., 2022). More than half of students reported they agreed or strongly agreed to having a good relationship with adults and older adults in their families (Fisher et al., 2022). According to results from the Geriatric Attitudes Scale, many respondents agreed with being asked: most old people are pleasant to be with (47.3%); it is interesting listening to old people's accounts of their past experiences (55.2%); and that it is society's responsibility to provide care for its older adults (51%) (Fisher et al., 2022).

A major theme identified through this study was the student's fear of decline with aging (Fisher et al., 2022). Decline was broken into physical, mental, and non-specific decline (Fisher et al., 2022). Additionally, Fisher et al. (2022) discovered students had fears regarding reduced independence, death and dying, loneliness and isolation, loss of others, regret, impact on others, and diminished life purpose or significance within older adults. Fisher et al. (2022) found that students are subject to hearing negative perspectives on older adults with seven themes describing what they hear (Fisher et al., 2022). Negative responses in the study by Fisher et al. (2022) described older adults as being grumpy, mean, and stubborn. Student responses also indicated that they believed older adults need more care because students associated aging with physical and mental decline (Fisher et al., 2022). Students' perceptions exposed that they think older adults are viewed as a burden to society (Fisher et al., 2022). Fisher et al. (2022) discovered that stereotyping, biases, and negative stigmas surrounding older adults contribute to their treatment and perceived inadequacies in care (Fisher et al., 2022). Negative feelings were

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reported towards students' own aging, and misconceptions about the aging process were identified and negatively correlated with confidence and interest in working with older adults across the eight professions analyzed (Fisher et al., 2022).

Fisher et al. (2022) found that student responses when asked to describe older adults are consistent with negative stereotypes reported across the literature. These stereotypes included descriptions such as illness, impotency, ugliness, mental decline and illness, worthlessness, isolation, low-income, and sad or depressed. Furthermore, students in this study reported a general perception that care for older adults is inadequate. Fisher et al. (2022) suggest that this is justified because of narrative reports detailing personal accounts of witnessing stereotyping, biases, prejudices, and/or negative stigma towards the treatment of older adults.

Systematic reviews have identified barriers to working with older adults in medical and nursing students (Fisher et al., 2022). Barriers included negative attitudes related to stereotypes and the complexity of illnesses in older adults as reported by medical and nursing students (Fisher et al., 2022).

### **Interventions Aimed at Ageism**

Limited exposure to a variety of clinical opportunities can result in students having a limited understanding of the workforce (Leonard et al., 2016). If clinical education began earlier in education, it may afford students the opportunity to experience a greater variety of clinical settings and increase their understanding of the different settings available in speech-language pathology (Leonard et al., 2016). Darling (2016) recommends gerontology courses and minor areas of study may heighten undergraduate CSD students' sensitivity towards older adults and end their desire to work with this population (Darling, 2016). López-Hernández et al. (2021)

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reason that studying older adults should help to increase students' attitudes towards older adults. More specific education on this population would help students to understand the aging process, diseases, and disorders that affect older adults resulting in more competent students that are more equipped to avoid negative stereotypes because of increased knowledge of older adults (López-Hernández et al., 2021).

Heape et al. (2020) suggest increasing education and clinical experiences with older adults will help to eliminate ageism within health care professions. In medical schools, experience with geriatric medicine is likely offered as an elective with few institutions (~25%) requiring courses on this population (Heape et al., 2020). Co-learning opportunities between students and older adults increase the duration of time spent with the opposite generation. Heape et al. (2020) report that co-learning decreased student's negative views of older adults. Such results came from education, intergenerational contact, or a combination of these strategies (Heape et al., 2020). Research findings propose that strategies to decrease ageism are most effective in young adults. (Heape et al., 2020). This means implanting such strategies, especially education, earlier in students' education and careers will decrease ageism and improve older adults' quality of life because of clinicians being more culturally competent (Heape et al., 2020).

Other previous authors have suggested that infusing more courses and including interprofessional-focused learning experiences may increase undergraduate students' knowledge and attitudes towards older adults (Darling, 2016). Chen et al. (2011) proposes that the integration of activities that improve student understanding and attitudes towards various patient populations should be integrated into curriculum requirements to promote patient-centered care. This integration can be through clinical experiences, interprofessional practice experiences, and elective courses focusing on older adults (Chen et al., 2011). Heape et al. (2020) identified a

reduction in discrimination in college-aged students when opportunities for students to connect with older adults and educational opportunities were combined.

Fisher et al. (2022) propose that educators teach baseline knowledge to students regarding chronicity, progression, and complexity of illness that affect older adults. Furthermore, educators can implement skill building instruction to learn how to end a lengthy patient interaction politely and respectfully (Fisher et al., 2022). This may prevent negative experiences in hopes of impacting attitudes towards older adults to ultimately influence career preference towards possibly treating older adults (Fisher et al., 2022).

### **Summary and Purpose of the Study**

Overall, the current literature suggests that as the aging population grows, more SLPs are needed to be motivated to work with this vulnerable population. However, as the number of speech pathologists working in settings where adults are treated is lower than those working with school-aged individuals (ASHA Member, 2021; Bureau of, n.d.), it is important to determine what barriers and factors influence students' decisions to work with older adult versus pediatric populations. To examine these barriers and attitudes toward working with older adult populations, the current study developed a survey to specifically examine (1) any changes in students' perceptions of working with older adults that may occur between undergraduate and graduate school; (2) how students' previous interactions and experiences with older adults relate to their attitudes of working with older adults in the future; (3) how pre-existing attitudes toward older adults influence employment preferences of speech-language pathology students; (4) if speech language pathology students' attitudes and experiences are similar to students in other health care professions (e.g., nursing); and (5) if there is a relationship between courses related to aging and older adults and student preference for age of patient population.

## **Methods**

A survey instrument was developed to identify what factors influence population preferences among speech-language pathology students. Specifically, the survey aims to aid researchers in exploring patterns and perceptions as to how SLP students perceive working with older adults. Because no existing instrument was identified in the review of published literature, the need for a new instrument was determined for this study. The instrument was developed in a manner to succinctly answer the aforementioned research questions, and a description of the instrument is outlined below.

## **Results**

### **Questions on Student Background**

Survey questions 1 through 5 begin the survey by asking students demographic questions to gain insight into their age, gender identity, education level, and what institution they attend. The aim of these questions is to identify if there are any changes in students' perceptions of working with older adults that may occur between undergraduate and graduate school as well as to explore any other personal factors which may influence students' perceptions.

### **Questions on Pre-existing Population Preferences**

Some questions were developed to gain insight into the population preferences of current SLP students. Students are asked to rank preference for client age broken into the categories of infants/toddlers, preschool-aged, elementary-aged, young adolescence, adolescence, adult, middle aged, and geriatric populations in question 6. This question aims to gain information on which population current students are hoping to pursue when they enter the field. Of the same age groups, question 7 has students rank how comfortable they are treating each group on a scale

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where the lowest score is valued at extremely uncomfortable, and the highest score valued at feeling extremely comfortable working with that population.

Population preferences in recent years have shown SLPs are entering school-based positions more rapidly than hospital and medical based settings (ASHA Member, 2021; Bureau of, n.d). Question 8 in the survey asks students to rank settings based on preferability to gain knowledge on settings where students are hoping to gain employment in. Data will provide insight into settings that might expect to see continued desire or increased preference compared to settings that have less preference.

Question 28 has participants select how likely it was that they entered speech-language pathology wanting to work with older adults in mind. This question provides information on how much consideration students put into possible ages that they can work with in the future and can be used to determine any relationships between future client population preference and other factors examined in the survey.

### **Questions on Previous Student Experiences with Older Adults**

Questions on previous experiences with older adults were developed to gain understanding of how students' previous interactions and experiences with older adults relate to their attitudes of working with older adults in the future. Question 9 asks students to rate their experience levels with the age groups as divided above. Previous research has shown that experience plays a part in how a population is perceived and the attitudes displayed towards members of that population (Chen et al., 2011; Darling, 2016; López-Hernández et al., 2021).

Questions 11 through 16 ask participants to rate their comfort level working with children, adults, and older adults. After rating their comfort level, they are asked to describe their

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reasoning in an open response format. Comfort levels among participants may be linked to previous experiences with individuals from various age groups. Questions 17 and 18 ask participants to describe experiences that they have had with non-familial children and older adults. This can reveal if students have encountered individuals that may have impacted their generalized perception of different populations.

Question 19 asks participants to rate their attitude towards older adults and children within the community based on general interactions. This can reveal how day to day interactions with older adults and children influence students' perception of individuals in clinical settings.

### **Questions on Pre-existing Attitudes Towards Older Adults**

The following questions are directed at identifying how pre-existing attitudes toward older adult's influence employment preferences of speech-language pathology students, and if speech language pathology students' attitudes and experiences are like students in other health care professions (e.g., nursing). Ageism has been identified within the speech-language pathology field (Heape et al., 2020). Question 10 aims to uncover if SLP students harbor stereotyped feelings towards populations based on age by having participants label populations as "generally pleasant," "generally unpleasant," or "neutral." Question 26 also asks participants about their attitudes regarding older adults by having them select beliefs they hold about working with older adults. Answer options contain positive and negative biased opinions. This question attempts to reveal implicit biases that students may hold. In question 27, students can follow up their previous response and provide additional beliefs about working with older adults. Using a mixed-methods survey will provide richer information and give qualitative data that can be analyzed to reveal more insight.



### **Questions on Academic Background related to Older Adults and Aging**

Several questions were designed to examine if there is a relationship between courses related to aging and older adults and student preference for age of patient population. Questions 20 through 22 ask students about the age-related courses they have taken at their respective universities. Studies have shown that an effective method to fighting ageism and increasing attitudes towards older adults is taking courses in the aging process (Darling, 2016; López-Hernández et al., 2021).

Question 23 asks participants to rate their knowledge about aging and age-related communication disorders. Data from this question can be analyzed to see if there is a correlation between age-related classes and knowledge about aging in SLP students. Questions 24 and 25 question students if their graduate school offers placements in hospital, long-term, and assisted living facilities. These questions will provide insight on how clinical experiences may impact students' attitudes towards older adults.

### **Final Instrument**

The survey developed for the current study is presented in Appendix A. A twenty-eight-question survey was developed to answer five research questions. The questions being (1) do student perspectives of working with older adults differ between undergraduate and graduate level instruction; (2) is there a relationship between student attitudes of working with older adults and their previous interactions or experiences with older adults; (3) is there a relationship between student employment preferences and pre-existing attitudes; (4) do SLP students from undergraduate to graduate levels of training have comparable attitudes and experiences to other

health professions (e.g., nursing) and; (5) is there a relationship between coursework related to aging and older adults and student employment preferences for working with older adults.

Overall, the survey includes five questions on student background, four questions on pre-existing population preferences, ten questions on students' previous experiences with older adults, three questions on the pre-existing attitudes students hold towards older adults, and six questions on coursework related to aging and older adults.

### **Discussion and Future Directions**

The literature review conducted indicates that as the older adult population grows, more SLPs are needed to be motivated to work with this vulnerable population. However, ASHA and BLS statistics show that the number of speech pathologists working in settings where adults are treated is lower than those working with school-aged individuals (ASHA Member, 2021; Bureau of, n.d).

Despite this current trend, there is limited literature on the population preferences of current speech-language pathology students. The most notable and recent literature from Leonard et al. (2016) has begun to fill the research gap. When analyzing the population preferences in SLP graduate students, almost two thirds of students surveyed indicated that they wish to work with children in the future (Leonard et al., 2016). The current survey will help to identify if this trend persists among current SLP students. If so, this finding raises concerns that the demand for SLPs working with older adults will be met as the population of older adults grows. If many students entering the field wish to work with children, the demand of older adults will not be met. Likewise, those SLPs treating older adults will likely have increased caseloads since there will not be enough SLPs to meet the needs.

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Previous research has identified a shift between facility preference between undergraduate and graduate students (Leonard et al., 2016). Specifically, graduate students reported that they more often wished to work in schools (Leonard et al., 2016). This indicates that their preferred population to treat would be children. On the other hand, undergraduate students reported that they wished to work in hospitals (Leonard et al., 2016). It is possible that a barrier developed that caused students to shift from hospital to school preferences. One purpose of the survey developed for the current study will be to examine any changes in students' perceptions of working with older adults that may occur between undergraduate and graduate school.

Previous existing literature has suggested that students' perceptions of older adults could be related to prior experiences/interactions with older adults or lack thereof (Chen et al., 2011; Darling, 2016; López-Hernández et al., 2021). Previous existing literature suggested that college students' perceptions of older adults were negative and stereotypical in general (Fisher et al., 2022; Ortiz-Rubio et al., 2020). This could be explained by students having poor interactions with older adults and generalizing their experience to all clients that are within that age category. Another purpose of the survey developed for the current study will be to examine how students' previous interactions and experiences with older adults relate to their attitudes of working with older adults in the future.

Previous research has also identified that older adults are more at risk of experiencing negative attitudes, prejudice, stereotyping, and discrimination (Ayalon et al., 2019; Gallo, 2019) due to their age. These attitudes could be another possible factor influencing students' future employment choices prior to clinical interactions. Thus, the current survey will be designed to examine how pre-existing attitudes toward older adult's influence employment preferences of

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speech-language pathology students. Furthermore, most of the current literature on the public health issue of ageism is within nursing and medical disciplines outside of speech-language pathology (Darling, 2016; Fisher et al., 2022; Gallo, 2019). Thus, another purpose of the current survey will be to examine if speech language pathology students may also have similar reservations and experiences as nursing and medical students.

Another possible influential factor could be the knowledge about aging and older adult related coursework (Darling, 2016; López-Hernández et al., 2021). More than half of the communication science disorders students reported that they had less than two classes who discussed older adult related communication disorders (Darling, 2016) and little knowledge regarding aging. This factor is potentially directly related to the lack of students who are interested in pursuing work with older adults in the future. As such, the current survey will examine the relationship between courses related to aging and older adults and student preference for age of patient population.

Finally, it has been found that intervention strategies can increase attitudes and knowledge about older adults but do not have an influence on the number of students entering the workforce to treat older adults (Fisher et al., 2022). This finding suggests that the perceptions of work environments and/or settings is another potential barrier to students working with older adults in those settings. Although not examined in the current proposed study, this could be another avenue of future research, especially if results from the current study find mostly favorable attitudes toward working with older adults.

### **Future Implications**

Since speech-language pathology is becoming more popular, with more professionals becoming ASHA certified (ASHA Member, 2021), it is hopeful that those entering the field may be willing and interested in treating older populations. The results of the survey developed for the current study will add to the literature to determine if the field will be able to keep up with the increasing demand (Darling, 2016) for those willing to treat adults and older adults. It is possible that if changes are not made, older adults will not have adequate access to age-related services that they will require involving speech, language, swallowing, and cognition. Results from the current survey will provide essential information in determining what factors influence students' decisions when deciding their preference for patient population related to age. This information will be useful in determining recommendations for SLP programs to ensure the demand for SLPs working with adults can meet the upcoming needs of older adult populations.

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**Appendix A**

How old are you?

Which of the following best describes the current level of your studies?

Undergraduate Student

Master's Student

Post-baccalaureate Student

PhD Student

What gender do you identify as?

Male

Female

Non-binary / third gender

Prefer not to say

What university do you attend?

If you have previously attended another college or university, please name it here

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Rank your age preference of clients 1-8 (1=least preferable, 8=most preferable)

- Infants/toddlers: 0-2 years old
- Preschool aged: 3-4 years old
- Elementary aged: 5-10 years old
- Young adolescence: 11-17 years old
- Adolescence: 18-25 years old
- Adult: 26-40 years old
- Middle aged: 41-65 years old
- Geriatric: 65+ years old

Please select how comfortable you are on a scale of 1-10 (1=extremely uncomfortable, 10=extremely comfortable) regarding treating clients of the following populations

Extremely uncomfortable 1 2 3 4 Somewhat uncomfortable 5 Neither comfortable nor uncomfortable 6 7 8 Somewhat comfortable 9 10 Extremely comfortable

Infants/toddlers: 0-2 years old  
1

Preschool aged: 3-4 years old

Elementary aged: 5-10 years old  
1

Young Adolescence: 11-17 years old

Adolescence: 18-25 years old

Adult: 26-40 years old

Middle aged: 41-65 years old

Geriatric: 65+ years old

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Rank your setting preference (1= least preferable, 5= most preferable)

|                   |
|-------------------|
| Private Practice  |
| School            |
| Hospital          |
| Skilled Nursing   |
| Home Health       |
| University Clinic |

Rate your experience level with the following populations on a scale of 1-10 (1= extremely inexperienced, 10=extremely experienced)

Extremely Inexperienced 1      2      3      4      5      6      7      8      9      10  
 Somewhat Inexperienced      Neither experienced nor inexperienced      Somewhat experienced      Extremely experienced

Infants/toddlers: 0-2 years old

1

Preschool aged: 3-4 years old

1

Elementary aged: 5-10 years old

Young Adolescence: 11-17 years old

Adolescence: 18-25 years old

Adult: 26-40 years old

Middle aged: 41-65 years old

Geriatric: 65+ years old



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Rate how you perceive the following age groups on a scale of 1-10 (1=generally unpleasant, 10=generally pleasant)

Generally Unpleasant 1 2 3 4 5 Neutral 6 6 7 8 Generally Pleasant 9 10

Infants/Toddlers: 0-2 years old



Preschool aged: 3-4 years old



Elementary aged: 5-10 years old



Young Adolescence: 11-17 years old



Adolescence: 18-25 years old



Adults: 26-40 years old



Middle-aged Adults: 41-65 years old



Older Adults: 65+ years old



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On a scale of 1-10, rate how comfortable you feel working with children (1= uncomfortable, 10=comfortable)



In a few words, please explain your rating above about comfort working with children

On a scale of 1-10, rate how comfortable you feel working with adults (1= uncomfortable, 10=comfortable)



In a few words, please explain some reasons why you rated yourself above on your comfort level working with adults

Rate how comfortable you feel working with older adults (1= extremely uncomfortable, 10= extremely comfortable)



In a few words, please explain some reasons why you rated yourself above on your comfort level working with older adults

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What experiences have you had working with children outside of your family? If none, list "none"

What experiences have you had working with older adults outside of your family? If none, list "none"

Rate your general interactions with the populations below on a scale of 1-10 (1= extremely negative, 10= extremely positive)

Extremely Negative 1 2 3 4 5 6 7 8 9 10  
Somewhat Negative Neutral Somewhat positive Extremely Positive

Children

Older Adults

### References

- American Speech-Language-Hearing Association. (n.d.). *Market trends in audiology and speech-language pathology*. in *Audiology and Speech-Language Pathology*. Retrieved February 4, 2023, from <https://www.asha.org/careers/market-trends/>
- ASHA Member & Affiliate Profile Trends 2001–2021. (2021). Retrieved February 5, 2023, from <https://www.asha.org/siteassets/surveys/2001-2021-member-and-affiliate-profile-trends.pdf>
- Ayalon, L., Dolberg, P., Mikulionienė, S., Perek-Białas, J., Rapolienė, G., Stypinska, J., ... & de la Fuente-Núñez, V. (2019). A systematic review of existing ageism scales. *Ageing research reviews*, 54, 100919.
- Bureau of Labor Statistics, U.S. Department of Labor, *Occupational Outlook Handbook*, Speech-Language Pathologists, at <https://www.bls.gov/ooh/healthcare/speech-language-pathologists.htm> (visited September 30, 2022).
- Chen, A. M., Plake, K. S., Yehle, K. S., & Kiersma, M. E. (2011). Impact of the geriatric medication game on pharmacy students' attitudes toward older adults. *American Journal of Pharmaceutical Education*, 75(8).
- Dahlke, S., Davidson, S., Kalogirou, M. R., Swoboda, N. L., Hunter, K. F., Fox, M. T., ... & Salyers, V. (2020). Nursing faculty and students' perspectives of how students learn to work with older people. *Nurse Education Today*, 93, 104537.
- Darling, R. M. (2016). Knowledge of aging and attitudes toward older people by communication sciences and disorders students. *Contemporary Issues in Communication Science and Disorders*, 43(Spring), 50-63.
- Fisher, K., Watson, J., Willis, J. L., Hawley, D., Severance, J., Butler Carroll, T., & Jackson, L. (2022). Collective Perceptions of Aging and Older Persons Held by Students From Eight Healthcare Professions. *Journal of Applied Gerontology*, 41(3), 855-866.
- Gallo, V. (2019). Ageism in nursing education: A review of the literature. *Teaching and Learning in Nursing*, 14(3), 208-215.
- Heape, A., Causey, B., Lloyd, T., & Jeter, S. (2020). Ageism among graduate students in

- communication sciences and disorders: a longitudinal analysis. *Perspectives of the ASHA Special Interest Groups*, 5(5), 1306-1312.
- Leonard, M. V., Plexico, L. W., Plumb, A. M., & Sandage, M. J. (2016). Emerging practice preferences of speech-language pathology students. *Contemporary Issues in Communication Science and Disorders*, 43(Fall), 285-298.
- López-Hernández, L., Martínez-Arnau, F. M., Castellano-Rioja, E., Botella-Navas, M., & Pérez-Ros, P. (2021, September). Factors affecting attitudes towards older people in undergraduate nursing students. In *Healthcare* (Vol. 9, No. 9, p. 1231). MDPI.
- Ortiz-Rubio, A., Lobato, R. M., & Valenza, M. C. (2020). Kogan's Attitude toward Old People scale revisited: Psychometric properties and recommendations. *Archives of Gerontology and Geriatrics*, 90, 104159.
- Vincent, G. K. (2010). *The next four decades: The older population in the United States: 2010 to 2050* (No. 1138). US Department of Commerce, Economics and Statistics Administration, US Census Bureau.