

**HEALTHCARE PRACTITIONERS' SELF-EFFICACY  
WORKING WITH AUTISTIC OLDER ADULTS**

A Thesis submitted to the faculty at Stanbridge University in partial fulfillment of the requirements for the degree of Master of Science in Occupational Therapy

by

Sandra Donoyan, Dima Estwani, Jennifer Fattal, and Rocen Santos

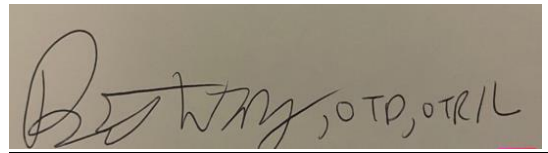
Thesis advisor: Bill Wong OTD, OTR/L

August 2021

© 2021  
Sandra Donoyan, Dima Estwani, Jennifer Fattal, and Rocen Santos  
ALL RIGHTS RESERVED

## Certification of Approval

I certify that I have read Healthcare Practitioners' Self-Efficacy Working with Autistic Older Adults by Sandra Donoyan, Dima Estwani, Jennifer Fattal, and Rocen Santos, and in my opinion, this work meets the criteria for approving a thesis submitted in partial fulfillment of the requirements for the degree of Master of Science in Occupational Therapy at Stanbridge University.

A rectangular box containing a handwritten signature in black ink. The signature is cursive and reads "Bill Wong, OTD, OTR/L".

Bill Wong OTD, OTR/L

Instructor of Occupational Therapy

ACCEPTED

A handwritten signature in black ink that reads "Vikas Sharma, OTD, OTR/L".

---

Vikas Sharma, OTD, OTR/L

Program Director, Master of Science in Occupational Therapy

### **Acknowledgments**

We would like to acknowledge and give our warmest thanks to our thesis advisor, Dr. Bill Wong, OTD, OTR/L, who made this research project possible. His expertise, encouragement, and support guided us through this rigorous process. We would also like to thank our Australian collaborators, Dr. Caroline Mills, PhD, OTR/L and Dr. Kristy Coxon, PhD, OTR/L, who provided valuable feedback propelled us to further our research. A special thanks to Dr. Sharma and the Department of Occupational Therapy at Stanbridge University for creating a project that enticed our creative and scientific minds. Finally, thank you to Dr. Alexander Moran and Frederick Poling for your guidance throughout the entire thesis process.

## Abstract

**Introduction:** Our study focuses on healthcare professionals' quality of care for autistic adults aged 50 years or older. We aimed to compare intervention methods of these practitioners across two disciplines, varying from occupational therapists to physical therapists. **Objective:** Our research study aimed to probe the quality of care that healthcare practitioners bestow upon their autistic older adult patients. The data we collected serves as determinants on whether these professionals require more training to care for and provide for this population. **Methods:** Participants were recruited through an email listserv, Facebook groups for healthcare practitioners, and any participants who learned of the study through its flyers. Of the 30 participants, 28 met the inclusion criteria — 22 were occupational therapy practitioners and 6 were physical therapy practitioners. Participants completed a survey with qualitative and quantitative components. **Results:** A significant difference was found between occupational therapy and physical therapy practitioners in the exposure of working with autistic older adults. The results indicated that occupational therapy practitioners reported higher confidence rates when asked to work with autistic older adults. **Conclusion:** Our study suggests a direction for future healthcare practitioners working with autistic older adults. The results of this pilot participatory study provided input from participating practitioners to better inform and educate employees on interactions with this population to enhance therapeutic relationships. The data collected in the survey enhances the knowledge sought after and acquired by healthcare professionals.

## Table of Contents

Purpose.....	1
Literature Review.....	3
Ethical Considerations .....	6
Informed Consent.....	6
Anonymity and Confidentiality.....	7
Validity.....	7
Sampling Criteria .....	8
Theoretical Framework.....	9
Methodology .....	11
Data Collection.....	11
Participants .....	12
Study Design .....	13
Results.....	14
Discussion.....	28
Limitations .....	32
Future Implications and Application to Occupational Therapy .....	33
References.....	35
Appendix A.....	38

Appendix B .....	39
Appendix C .....	42

## List of Figures

Figure 1: Number of OT practitioners compared to PT practitioners.....	15
Figure 2: Number of OT practitioners compared to PT practitioners per degree.....	16
Figure 3: Setting of work .....	17
Figure 4: Years of experience working with older adults (50+years) .....	18
Figure 5: Experience working with autistic older adults .....	18
Figure 6: Personal experiences working with autistic older adults.....	19
Figure 7: Years of experiences working with autistic older adults (50+ years) .....	20
Figure 8: Level of preparation working with autistic older adults (50+ years) .....	21
Figure 9: Autism training received during school and/or at workplace.....	22
Figure 10: Results of independent samples t-test and descriptive statistics for overall level of confidence by professional title .....	23
Figure 11: Results of Qualitative data and parent codes by highest degree of education .	27
Figure 12: Results of Qualitative data and parent codes by professional title .....	27
Figure 13: Results of frequency of Autism resources by professional title.....	28



### **Healthcare Practitioners' Self-Efficacy Working with Autistic Older Adults**

Autism is diagnosed in 1 in every 54 children, affecting males four times more than females (Centers for Disease Control and Prevention, 2020). In regard to autism, there is little defining literature that explores this disorder in older adults. Most of the available research is focused around children and their families or caregivers. It is important to remember that autism follows an individual throughout the lifespan, not only school-aged children, but through adulthood and later adulthood, as an individual faces the challenges of onset of other age-related diseases. Since people will spend the majority of their lives as adults, research needs to be conducted that explores the challenges that autism may pose for older adults. There have been few studies conducted to investigate this area is a telling sign that this topic requires more attention. <sup>1</sup>

#### **Purpose**

This research focused on the healthcare professionals' quality of care for autistic adults aged 50 years or older. We aimed to compare intervention methods of these practitioners across two disciplines, varying from occupational therapists to physical therapists.

Zebro et al. (2015) found that there is a lack of healthcare practitioner awareness and necessary training, such as appropriate communication strategies, when treating autistic older adults. Autistic older adults are also more susceptible to physical and mental health conditions when compared to neurotypical adults. It is difficult to

---

<sup>1</sup> As a disclaimer, this thesis manuscript will use identity-first language over person-first language on the grounds that a majority of autistic individuals prefer identity-first language (Kenny et al., 2015).

anticipate the aging process due to the unpredictable and varied changes that autistic older adults experience. This means that annual health examinations and screenings are especially necessary for preventative care and effective management of chronic illnesses. Wise et al. (2019) studied the transition of autistic individuals from adulthood to older adulthood. They found that during this life transition, autistic older adults need more education and training with medication management and fall prevention. The research conducted in this thesis addresses the gaps in knowledge such as appropriate transition preparation, expectations regarding aging decline, adequacy of caregiver education, and scrutinizing patient-provider interaction with this specific population from the perspective of healthcare professionals. Addressing these areas will aid in preserving quality of life while forging a productive and successful lifestyle for individuals on the spectrum.

### **Problem Statement**

The vast majority of research primarily focuses on autism in childhood and adolescence. In his editorial, Fombonne (2012) mentions the limited available information regarding autistic older adults. He posits that there is a lack of evidence that explores longevity, quality of life, and sufficient care and support for autistic older adults. This is an issue because without a coherent foundation of expected aging and behavioral patterns for this population, autistic older adults are subject to poor health outcomes. Healthcare professionals can aid in providing long-lasting plans of care, teach skills required for independence, and reinforce overall life satisfaction. To do so, further research is necessary to scrutinize the current quality of care from clinical practitioners, determine gaps in healthcare delivery, and refine the distribution of optimal care and

support. Additionally, in a 2017 service analysis, U.S. healthcare costs for autistic adults were forecasted to be between \$175 to \$196 billion, with support services like community care, day-care programs, out-of-home respite, employment support, and in-home respite costs averaging to about \$13,500 per person per year (Duchinsky, 2017). This creates more urgency in refining healthcare services. Fostering independence, being cognizant of the aging processes via evaluations, assessments, and progress reports, and carefully addressing the specific physical, emotional, and social concerns of autistic older adults can not only aid in reducing healthcare costs but ensure optimal quality of life for this population.

### **Literature Review**

Previous research has been conducted to identify key themes and gaps in knowledge. Roestorf et al. (2019) surveyed healthcare providers to assess their awareness, knowledge, and comfort level when treating autistic patients, and found that there is a gap in knowledge across four continents about aging in autism in regard to well-being and quality of life. Zebro et al. (2015) found that many providers lack awareness and the necessary training, such as communication strategies, when treating autistic older adults. For example, many may gloss over the importance of communication because it is assumed to be understood by all. This lack in awareness and communication can lead to a number of health conditions being overlooked within this population. Ryzewska, et al. (2019) found that of the 6,649 autistic adults that were included in their study, 3,111, or 46.8%, of autistic adults had poor health, and 66.2% of autistic adults over the age of 65 reported having poorer health. Lack of training in this aspect may pose a future challenge for practitioners when it comes to building rapport,

and even with patient compliance and adhering to clinical advice. This could create negative implications in the future because noncompliance to practitioners' advice can lead to readmittance and increased hospitalizations. Also, according to Morris et al. (2019), many of the healthcare professionals across the studies referred to the complexity of working with autistic patients who often require additional services. They also identified that these patients often require additional support beyond that which is typically provided in their role as healthcare providers. Finally, Shooshtari et al. (2012) emphasized how autistic individuals often require more intense and skilled interventions to complete activities of daily living and instructional activities of daily living. This shows that there is a need to explore the quality and the available resources autistic individuals are receiving.

According to Stewart et al. (2020), autistic older adults 50 years and older are at greater risk to be diagnosed with physical and mental health conditions than neurotypical older adult populations. It is important that healthcare professionals are aware of this prevalence in case practitioners may need to seek resources and additional training to address the complex needs of this population. The results of another research study also found that autistic older adults are more likely to be diagnosed with physical and mental health conditions than the general older adult population (Hand et.al., 2020). Many adults are diagnosed with autism in later adulthood, leading us to believe the gap of knowledge is significant regarding the awareness of the prevalence in both physical and mental health conditions in autistic older adults. In a study by Ohl et al. (2020), a sample of American based occupational therapists reported using assessments that are not specific to autism or adults with autism. This shows that the autistic population may not be

evaluated with assessments that are directed towards their needs.

Understanding this population's needs is also important because according to Perkins and Berkman (2012) many autistic older adults do not receive the same access to screening and assessments as neurotypical older adults, experience more challenges during the aging process, and life expectancy is reduced when compared to the neurotypical population. Preparing them for adulthood transitions and carefully monitoring the aging process of autistic adults is needed for preventative care and effective management of chronic illnesses. Wise et al. (2019) found that community programs designed for autistic adults who require a high level of support should focus on overall medical health and promoting daily living skills. It is important to understand that the success of healthcare interaction solely depends on providers' knowledge, attitudes, skills, and behaviors in working with patients on the spectrum (Nicolaidis et al., 2015).

The gaps in knowledge that were identified within our literature review guided our question about self-efficacy among healthcare professionals when working with autistic older adults. Many current occupational therapy assessments and resources are not specific to autistic older adults (Ohl et al., 2020). More research is needed to understand the aging process for autistic older adults and how healthcare professionals can provide better care across the life span. The first comprehensive study was conducted in 2015 that integrated qualitative and quantitative research methods to explore adult healthcare providers' knowledge and comfort level in treating a growing population of adults with autism (Zerbo et al., 2015). It is vital to understand how equipped healthcare professionals feel when providing quality care for their patients. Results from a study indicated that a factor that differentiated positive and negative experiences were almost

always related to the interplay among patient, provider, and system level (Nicoladis et al., 2015). Our research indicates that current practices do not fully address the medical management and preventative care that autistic adults needs once they reach 50 years and older. This urges a greater need to close the gap between perceived knowledge about autism within the older adult community and the current healthcare demands of this population.

### **Ethical Considerations**

Ethical considerations are rules that help protect the participants' privacy and their rights. They are important because they uphold the moral integrity of the overall study. The following are the ethical guidelines that were placed into consideration while gathering information from the participants.

### **Informed Consent**

Researchers have an ethical responsibility to clearly explain research involvement to potential participants prior to their consent and participation. Informed consent protects the rights of the participants by ensuring they are treated ethically, providing full transparency of the study objectives and methodology, and granting them freedom to participate or withdraw from the study at any time. This is to ensure participants know every aspect of their participation in the survey. Our survey was distributed through an online platform for participants to complete. At the start of the survey, they were presented with an outline of the objectives. Due to the survey being taken online, implied consent was collected. Implied consent is consent that is not directly expressed by a person but implicitly granted. The start of the survey provided information about the study and if the participant chose to continue, it was identified as implied consent.

Participation was voluntary. Healthcare professionals that met the criteria of the survey were asked to complete it on their own time.

### **Anonymity and Confidentiality**

The anonymity and confidentiality of the participants were upheld at all times throughout the research. The participants were not asked to give any identifying information regarding their personal information, such as their name or license certification number, making them anonymous. The participants' credentials, highest degree achieved, and years of practice experience were only used for demographic information gathering purposes. All data were grouped, and findings were presented in aggregate. After we complete our work, Dr. Caroline Mills and Dr. Kristy Coxon, our group's primary collaborators, will have access to the data in order to complete the overall research in summer 2022. Dr. Wong has connected our group, at the start of the thesis study, to Dr. Mills and Dr. Coxon and communicated the purposes for the overall research project between Stanbridge University and Western Sydney University. The information collected in the survey will only be used for the purpose of the research and will exclude identifiable information.

### **Validity**

To ensure that our research is valid, meaning it measures accurately what is intended to be measured, we aimed to address relevant questions. Considering that this is a cross cultural research study, we used uniform language in our survey to avoid misunderstandings, which could have skewed our results. Prior to the start of our thesis group, Dr. Wong and Dr. Coxon collaborated on a cross-cultural research guide (see Appendix A) that also served as the inclusion and exclusion criteria for the research

conducted in both Australia and the United States. Therefore, the conclusions of the study will correlate to the questions posed to the participants in our survey. In addition, the methods used will relate specifically to the research questions in order to fulfill research ethics demands. Since there is little literature available regarding our research study topic, it is imperative that we provide accurate results. Our findings will attempt to fill in gaps in knowledge of practitioners working and interacting with autistic older adults for future researchers.

### **Sampling Criteria**

The sampling criteria consisted of a voluntary, internet-based survey. The survey was conducted through the American Occupational Therapy Association's CommunOT platform, an email blast from Occupational Therapy Association of California, and OT4OT group on Facebook among other social media groups. These platforms were chosen as a part of convenience sampling since they are the most accessible platforms to us. We used a designated email address to send out the email to different platforms and as a means for participants to contact our research team, should questions arise. This warranted convenient data collection since it was online as well as broadened our sampling pool. Survey questions required 5 short-written responses from survey participants, 18 Likert scale questions, and 9 multiple choice format questions. To maintain the participants' engagement, the duration time to complete the survey was between 10-20 minutes. Volunteers were asked to complete an eligibility questionnaire; if they did not meet study qualifications or they declined to participate, the survey ended, and they were thanked for their interest and time. To protect and respect each individual's privacy, we refrained from requesting any identifying information or documents and



trusted that all responses were honest and truthful. While few of us qualify, the entire research team was exempted from participating in the survey in order to avoid any conflicts of interest.

### **Theoretical Framework**

The Person-Environment-Occupation (PEO) model highlights how occupational performance is influenced by the interaction between person, environment, and occupation. A person's domain is influenced by the individual's role, self-concept, cultural background, personality, health, cognition, physical performance, and sensory capabilities (Law et al., 1996). Occupational performance takes place in an environment that is either cultural, socioeconomic, institutional, physical, and/or social. Demands and challenges are often presented to the person depending on the context they are in. Occupations include the need to participate in self-maintenance, expression, and life satisfaction. The emphasis of occupations should be on the complexity of tasks, degree of structure, duration of activity, and characteristics of task demands. The PEO model also takes into consideration how the three domains change and develop over time. This model can be used as both an assessment and intervention tool to analyze and enhance a client's occupational performance, respectively.

The first component of the PEO model is the person. This model defines a person to a holistic entity, meaning this model considers a person's mind, body, and spirit. A person is a unique being with a variety of roles. A person is always developing and interacting with their surrounding environment. The person and the environment are interdependent, and this interaction can impact occupational performance. Occupational performance is described as meaningful actions that an individual participates in. In our

research we identified factors that supported or hindered occupational performance and assessed possible outcomes. Our target population included healthcare professionals' working with autistic individuals over the age of 50. In collaboration with Western Sydney University researchers, we decided to adopt the age range of 50 and older because they are a particularly vulnerable population, as there are increasingly more age-related health issues starting at age 50 and onwards. The survey assessed the healthcare professionals' occupational performance and self-efficacy. We identified components that assessed the practitioners' experiences and their confidence levels when working with autistic older adults.

The second component for the PEO model is the environment. The environment can have enabling or constraining effects on occupational performance. In terms of our study, the environment can impact a clinician's ability to interact with clients who are autistic older adults. Environmental modifications may be easier for a person to adapt to than teaching remedial techniques to enhance each client's occupational performance. Having flyers or other resources that are readily available for reference before a healthcare professional interacts with a client can help the clinicians better serve the client. It is also important for healthcare professionals to understand that the environment can heavily impact autistic individuals. Autistic individuals are very sensitive to the sensory environment around them, such as coping with room changes, different smells, and interacting with different people. Healthcare professionals must take these things into consideration. This is especially important for healthcare professionals who work in facilities that house and interact with those individuals for extended hours of the day and extended period.

Occupation is the third component of the PEO model. Occupations involve tasks and activities that pertain to self-care, leisure, and productivity (Cole & Tufano, 2020). They can reflect an individual's intrinsic morals, beliefs, and values. This research focused on the productivity aspect, or work roles, of occupations that physicians must uphold while caring for autistic adults. With the wide array of healthcare specialties, a common denominator among all these physicians is the dedication to preserving their patients' health and wellbeing. Healthcare professionals are assumed to have a long-term commitment in catering their clinical expertise to optimally serve each patient. To do this, physicians must establish trust and affinity in order to build rapport with their patients; this not only addresses health concerns but also helps to advocate for the patient. Aging with autism does not parallel typical adult aging. Healthcare workers should be aware and respect the needs of the autistic older adults. This includes respecting their routine and engaging in occupations that are meaningful to them. This means that physicians, social workers, and mental and allied health need to carefully monitor adult patients with autism. By staying up to date with clinical literature, being knowledgeable about autism, and fulfilling their role entirely, healthcare professionals pave the way for adults with autism to live a long and meaningful life.

## **Methodology**

### **Data Collection**

This research utilized a survey methodology to collect data from our sample population. A centralized email was created for the purpose of our research. The research email account was created on Gmail to enable us to create our survey on Google Forms, which is a platform for collecting data. The purpose of creating a centralized email was to

dedicate this email strictly to this research. It helped us reach out to participants across different platforms. This allowed all the responses to be stored in one place and uphold the confidentiality of the participants, since only the personnel collaborating on this research have access to this account. Based on the responses, the survey identified whether or not the participants met the inclusion criteria.

### **Participants**

The target population for this research project were healthcare professionals who have interacted with autistic older adults over the age of 50. The healthcare professionals in this research included but are not limited to: occupational therapists and occupational therapy assistants, physical therapists and physical therapy assistants, speech therapists, dietitians, social workers, registered and vocational nurses, and respiratory therapists. After our data collection we had to limit our population to occupational therapists and physical therapists due to the lack of variety of healthcare professionals that responded to our questionnaire. An Institutional Review Board modification application was submitted and approved before changing our population to more specific healthcare fields. Our study was a participatory research design that encompassed research design and methods that used systematic inquiry in direct collaboration with those impacted by the issue being studied for the purpose of change or action (Vaughn & Jacquez, 2020). It emphasized direct engagement with health care practitioners who are closely working with autistic older adults and brings an in-depth perspective on their views and experiences.

### **Study Design**

Our survey was a combination of qualitative and quantitative methods. For the quantitative portion, we utilized the Likert scale ranging from 1-5. We utilized a Likert scale to identify healthcare professionals' comfort levels working with autistic older adults. Questions focused on rating their personal experiences and self-efficacy levels while working with this population. It allowed us to identify common themes and make inferences through the data collection. Questions evaluating their self-efficacy included their confidence levels about working with autistic individuals and detecting specific characteristics within this population. Other questions focused on the frequency of which they include family members or caregivers in the intervention plan, home modification training, and patient education.

In addition to the Likert scale questionnaire, respondents were also asked open-ended questions about their clinical experience while working with autistic older adults. They were asked to reflect and self-report their methods of practice via short answer responses. They also had an opportunity to share their personal experiences while working with this population. These survey questions aimed to scrutinize the level of knowledge and awareness that healthcare providers have when treating autistic patients. Questions covered topics relating to the number of years treating autistic older adults, awareness of the number of patients under their care, what they believe qualifies them to treat autistic older adults (such as relevant continued education courses, formal training), ways they promote and advocate for their patients' needs, and how they prepare autistic adults transition to older autistic adult living. Upon collection of all survey responses, we analyzed them to extract common themes. We created a parent code for each main idea

along with their subsequent child codes, which is a sub-category that stemmed from the main parent code. Doing so gave us a more in-depth representation of how the participants carry out their care towards a specific population. The overall themes, such as therapist service competency and accommodation strategies, displayed areas that most healthcare professionals successfully address and areas that lack attention. The mixed research approach reflects the participants' voices and ensures that their technical experience is included with a high level of objectivity.

### **Results**

A total of 30 responses were collected from our self-reported survey, and 28 of these responses were included in our data analysis. One respondent did not meet the inclusion criteria for our study and was excluded. Another response was from a physician. While a physician title is within our initial study scope, we deemed this data as an outlier and decided to exclude it after our modification of our sampling criteria. We decided that a single data entry from one field, that has no statistical significance from quantitative data, would not provide substantial evidence to draw qualitative conclusions. Though our study inclusion criteria were designed to obtain data from multiple disciplines, our respondents were from a much narrower target population than we expected. A statistician was consulted to ensure that the correct tests were utilized in interpreting our quantitative results. For the quantitative portion, we applied independent t-tests to analyze the data. An independent t-test was appropriate to use because of the following assumptions: the dependent variable is continuous, the independent is categorical with two groups, there is independence of observations, and there are no significant outliers. Our results compared the self-report data from occupational therapy (OT) practitioners against data from physical therapy (PT) practitioners (Registered

Physical Therapists or Physical Therapy Assistants (PTAs)). Of the 28 responses, 22 were from OT practitioners and 6 were collected from PT practitioners, as shown in Figure 1 below.

**Figure 1**

*Number of OT Practitioners Compared to PT Practitioners*

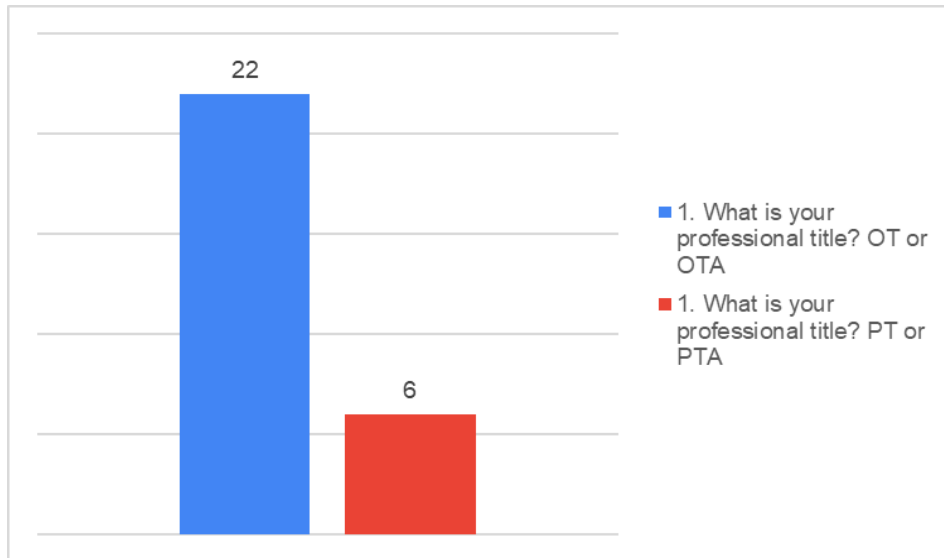


Figure 2 shows that the most common degree held by both OT and PT practitioners was a PhD or other doctorate degrees: OT (n=8, 36.3%), PT (n=3, 50%). While all responses were anonymous, based on the bar graph, at least half of the PT practitioners are either registered physical therapists or physical therapy assistants while there are two practitioners with bachelor's degrees, it cannot be verified that those degrees were relevant to physical therapy. The data shows that at least majority of the OT practitioners are OTR/Ls: six respondents hold master's and eight hold PhD or doctorate degrees. Like the PT practitioners with bachelor's degrees, we cannot verify that the bachelor's degrees of the six OT respondents are in relation to occupational therapy.

**Figure 2**

*Number of OT Practitioners Compared to PT practitioners per Degree*

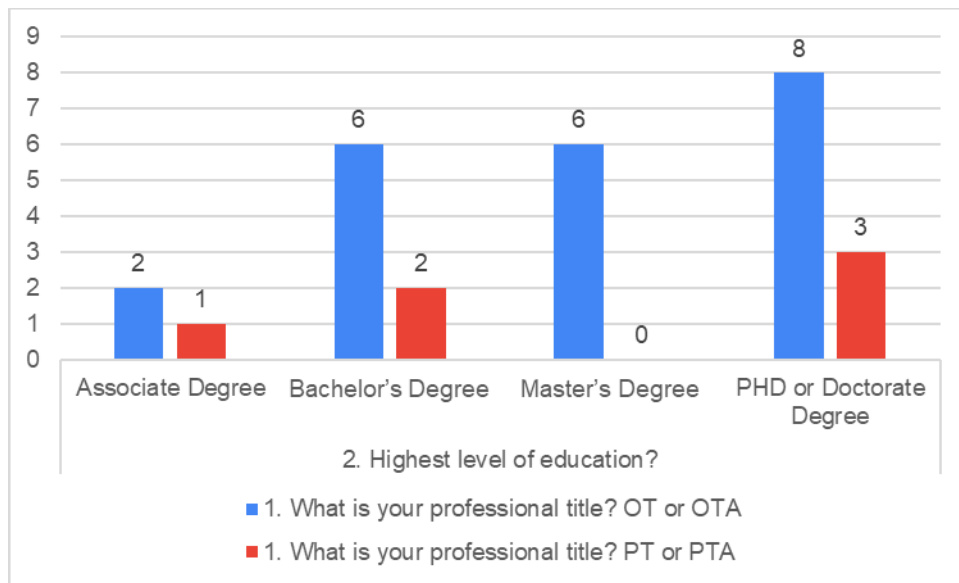


Figure 3 describes the work setting of each practitioner. While reports varied, the most common workplace was an inpatient or outpatient hospital setting. Seven OT practitioners (27.9%) reported working at a hospital, compared to a lower number of PT practitioners working in the same setting ( $n = 1$ ; 11.1%). This difference in percentage of working in a hospital setting (inpatient or outpatient) for OT versus PT practitioners was not statistically significant [ $z(N = 36) = 0.93, p = .352$ ] indicating an even comparison. Nursing homes/skilled nursing facilities and assisted living facilities were two settings in which both disciplines reported equal responses; four OT ( $n = 4$ ; 44.4%) and PT ( $n = 4$ ; 14.8%) practitioners work in nursing homes/skilled nursing facilities. None reported working in hand therapy or an independent living facility. Our results also suggests that OT practitioners are involved in a wider area of practice, but the difference in survey participants among the two disciplines may explain this finding.



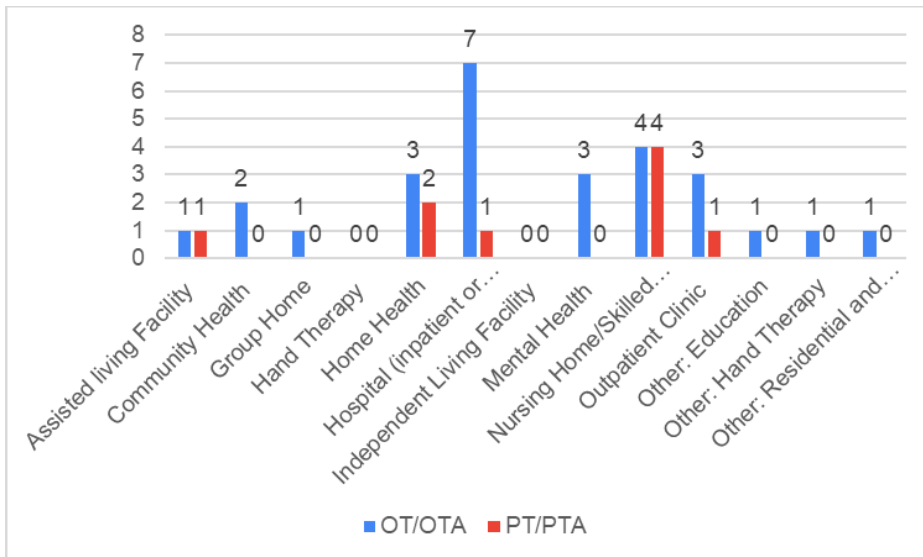
**Figure 3***Setting of Work: OT Practitioners Compared to PT Practitioners*

Figure 4 shows a stark difference in level of clinical experience between OT and PT. A chi-square test ( $\chi^2$ ) of association was performed between field and years of experience. Years of experience was originally coded in blocks and were treated as categorical and not continuous data. Over half of the OT respondents have at least 10 years of experience working with older adults ( $n=14$ , 63.4%); most of those ( $n=10$ , 45.5%) have over 20 years of experience, while most PT practitioners had 1–5 years of experience working with older adults ( $n = 5$ ; 83.3%). This difference in percentage of years of experience working with older adults for OT versus PT practitioners was not statistically significant [ $\chi^2(4, N = 28) = 8.70, p = .069$ ] indicating an even comparison.

**Figure 4**

*Years of Experience Working with Older Adults (50+ years): OT Practitioners Compared to PT Practitioners*

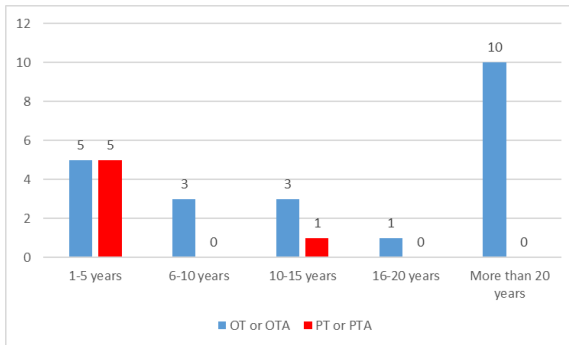


Figure 5 describes experience working with autistic older adults. A majority of OT practitioners indicated working with this population (n=16, 72.7%). Half of the PT practitioner respondents indicated having worked with autistic older adults while the second half indicated no experience (n = 3; 50.0%). This information is from our sample and does not capture all occupational therapists and physical therapists.

**Figure 5**

*Experience Working with Autistic Older Adults: OT Practitioners Compared to PT Practitioners*

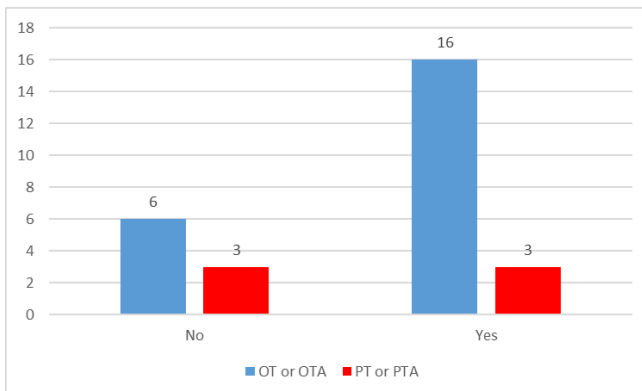


Figure 6 delineates personal encounters with autistic older adults. Since our question allowed respondents to “Select all that apply” respondents had the option to specify multiple areas for attaining experience. Most encounters pertained to clinical work (n=22, 68.8%).

### Figure 6

*Personal Experiences with Autistic Older Adults: OT Practitioners Compared to PT Practitioners*

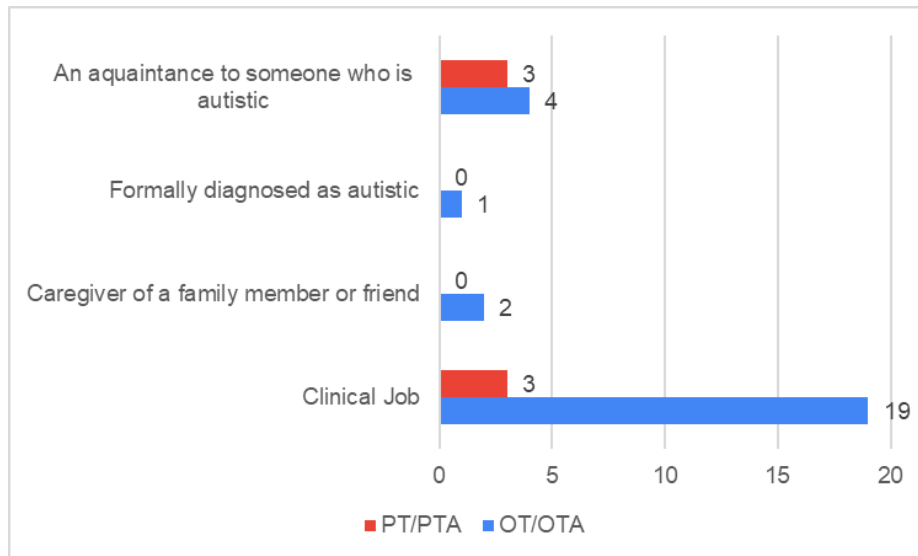


Figure 7 shows at the years of experience of these healthcare professionals working with autistic older adults. While the majority of our respondents have reported experience working with autistic older adults (see Figure 5), there is nearly an equal division of years among the professionals when describing treating this population. Of the 28 respondents, 10 (35.7%) reported having at least ten or more years of experience, 8 (28.6%) reported having 1–10 years of experience, and 10 (35.7%) reported having less than 1 year of experience.

**Figure 7**

*Years of Experience Working with Autistic Older Adults (50+ years): OT Practitioners Compared to PT Practitioners*

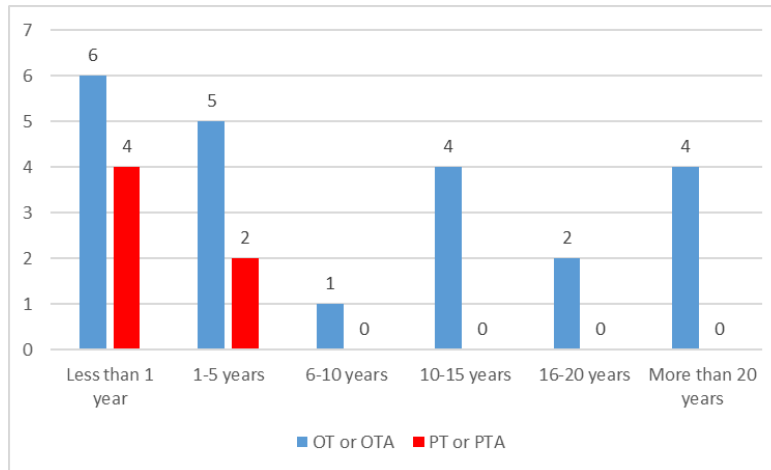


Figure 8 shows the self-reported confidence level of working with autistic older adults. More than half of the OT practitioners ( $n = 14$ , 63.6%) indicated that they had at least a fair level of confidence when working with this population, and 8 respondents (36.4%) indicated having somewhat or no confidence. Half of the PT practitioners expressed somewhat to fair confidence, while the second half shared no confidence. Additionally, Figure 8 indicates that most OT/OTA felt “somewhat confident” working with autistic older adults ( $n = 7$ ; 25.0%) while most PT/PTA felt “not confident” working with autistic older adults ( $n = 3$ ; 50.0%).

**Figure 8**

*Level of Preparation Working with Autistic Older Adults (50+ years): OT Practitioners Compared to PT Practitioners*

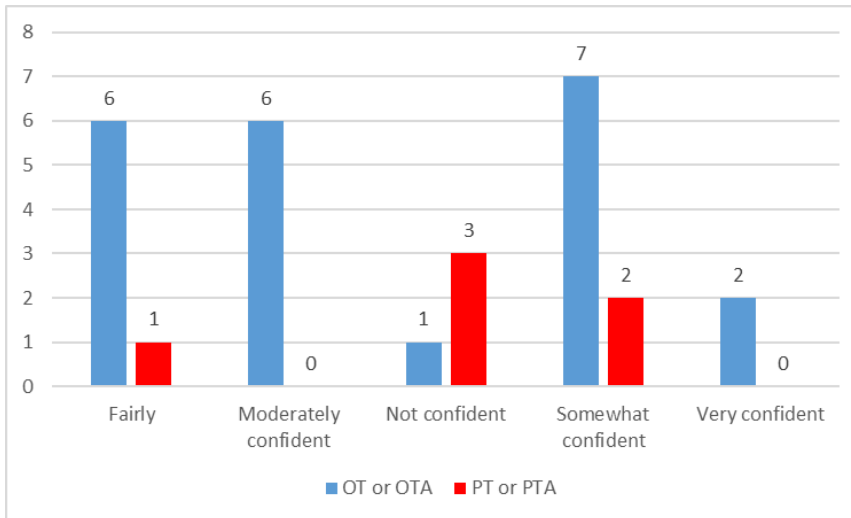


Figure 9 represents that these healthcare professionals are expanding their competence levels regarding autism. This question was also “Select all that apply,” so survey participants were allowed to choose more than one response. The main references for OT practitioners are continued education or professional development courses (n =14, 17.7%) and past school curriculum (n = 12, 15.2%) and reading peer-reviewed journal articles (n = 12, 15.2%). A lower number of PT practitioners have the same autism training received (n = 3; 37.5%).

**Figure 9**

*Autism Training Received During School and/or at Workplace: OT Practitioners  
Compared to PT Practitioners*

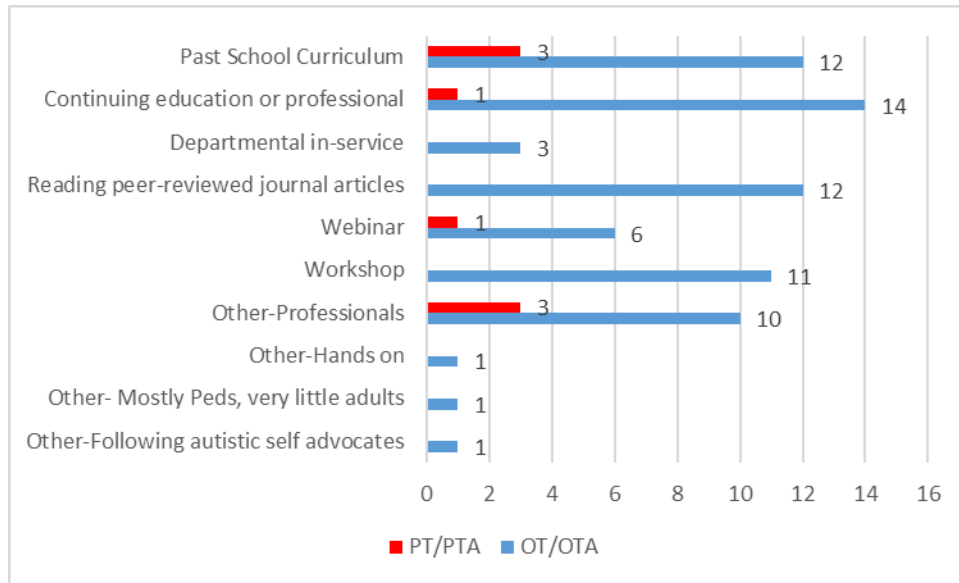


Table 1 and Figure 10 show an overall independent sample t-test was used to describe the overall level of confidence of OT and PT practitioners when providing care for autistic older adults. Overall level of confidence in providing care to autistic older adults did not differ significantly between OT and PT practitioners [ $t(26) = 0.39, p = .702$ ] indicating an even comparison (see Table 1 and Figure 10). Table 2 and Figure 11 show itemized independent samples t-test for the two disciplines to describe their clinical approach for client treatment. There were no outliers and the most common topics to address that practitioners indicated were, “Be aware of when my own feelings affect my communication with the patient,” “Treat the patient in a caring manner,” and “Make the patient feel that I have time to listen.”

**Table 1**

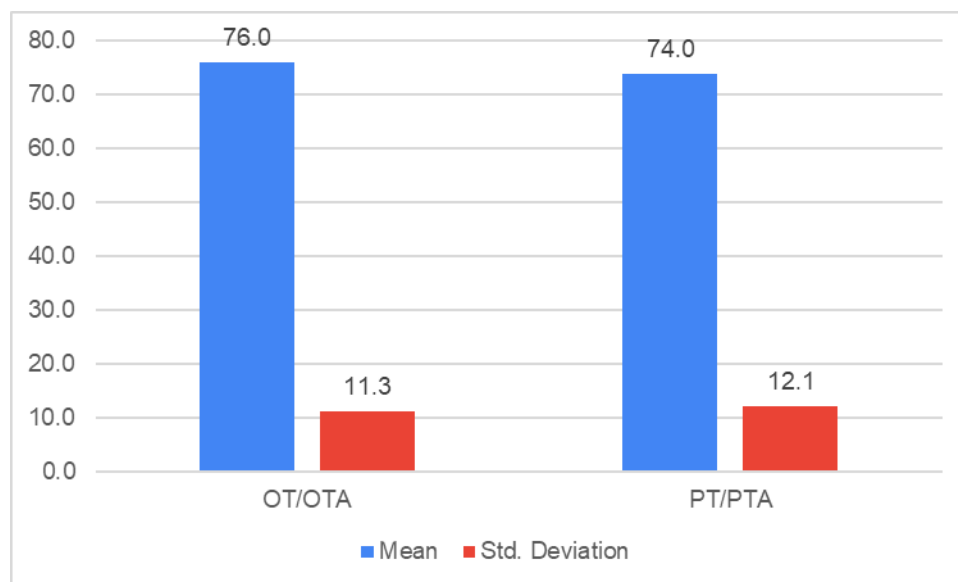
*Results of Independent Samples T-Test and Descriptive Statistics for Overall Level of Confidence by Professional Title*

Title	Overall Level of Confidence Providing Care to Autistic Older Adults		n	95% CI for Mean Difference	t	df	p
	M	SD					
OT/OTA	76.0	11.3	22	-8.8, 12.9	0.39	26	.702
PT/PTA	74.0	12.1	6				

*Note.* CI = confidence interval. M = mean. SD = standard deviation. df = degrees of freedom. p = p-value.

**Figure 10:**

*Results of Independent Samples T-Test and Descriptive Statistics for Overall Level of Confidence by Professional Title*



**Table 2**

*Results of Independent Sample T-Tests and Descriptive Statistics for Level of Confidence  
by Professional Title and by Item*

Item		n	M	SD	p
Make the patient feel that I am genuinely interested in knowing what he/she thinks about his/her situation	OT/O	2	4.4	0.85	.611
	TA	2			
	PT/PT A	6	4.2	0.75	
Make the patient feel that I have time to listen	OT/O	2	4.6	0.50	.059
	TA	2			
	PT/PT A	6	4.2	0.41	
Recognize the patient's thoughts and feelings	OT/O	2	4.4	0.79	.131
	TA	2			
	PT/PT A	6	3.7	1.51	
Be attentive and responsive	OT/O	2	4.5	0.96	.506
	TA	2			
	PT/PT A	6	4.2	0.75	
Be aware of when the patient is scared or concerned	OT/O	2	4.0	1.00	.337
	TA	2			
	PT/PT A	6	3.5	1.05	
Treat the patient in a caring manner	OT/O	2	4.7	0.65	.958
	TA	2			
	PT/PT A	6	4.7	0.52	
Make the patient experience me as empathetic	OT/O	2	4.2	0.91	.970
	TA	2			
	PT/PT A	6	4.2	0.75	
Make the patient feel that he/she can talk with me about confidential, personal issues	OT/O	2	4.2	0.75	.766
	TA	2			
	PT/PT A	6	4.3	0.82	
Focus on compassion, care and symptomatic treatment, when there is no curative treatment	OT/O	2	4.3	0.84	.708
	TA	2			
	PT/PT A	6	4.2	0.98	
Reach agreement with the patient about the treatment plan to be implemented	OT/O	2	4.0	0.84	.909
	TA	2			



	PT/PT A	6	4.0	0.89	
Advise and support the patient in making decisions about his/her treatment	OT/O	2	4.4	0.79	.131
	TA	2			
	PT/PT A	6	3.7	1.51	
Ensure that the patient makes his/her decisions on an informed basis	OT/O	2	4.2	0.69	.232
	TA	2			
	PT/PT A	6	3.8	0.75	
Explain things so that the patient feels well-informed	OT/O	2	4.2	0.81	.322
	TA	2			
	PT/PT A	6	3.8	0.98	
Explain how the treatment plan works or is expected to work so that the patient understands them	OT/O	2	4.1	0.99	.400
	TA	2			
	PT/PT A	6	4.5	0.55	
Be aware of when my own feelings affect my communication with the patient	OT/O	2	4.1	0.83	.153
	TA	2			
	PT/PT A	6	4.7	0.52	
Deal with my own emotional reactions when the situation is difficult for me	OT/O	2	4.0	0.87	.657
	TA	2			
	PT/PT A	6	4.2	0.41	
To maintain the relationship with the patient when they are noncompliant	OT/O	2	3.8	1.23	.466
	TA	2			
	PT/PT A	6	4.2	0.75	
To provide services appropriate to the client's needs	OT/O	2	4.1	1.15	.881
	TA	2			
	PT/PT A	6	4.2	0.75	

*Note.* M = mean. SD = standard deviation. p = p-value.

The survey consisted of 6 qualitative data questions that asked healthcare practitioners about their previous experience and knowledge working with autistic older adults. The parent codes derived from the responses of the 6 questions were: communicating clearly, client response to therapy, accommodations and modifications, and therapist service competency. The code with the highest number of responses was

communicating clearly. Figure 12 shows 19 responses from OT practitioners and 7 responses from PT practitioners. The data shows that communicating clearly with an autistic older adult during assessments and intervention planning is one of the most important aspects of providing quality care to patients. Barriers and challenges identified when working with autistic older adults included noncompliant behavior, communication challenges, and challenging environments. The second most common parent code is accommodations and modifications with a total score of 19. Suggested accommodations and modifications included environmental modifications (lighting, loud noises, roommates), providing a less stimulating environment, providing options, and preparing them in advance for any foreseeable changes. Autonomy and self-advocacy were the third leading parent code when analyzing the results. Patient education was a common response when asked how to advocate for older autistic adults. While Figure 12 displays the overall qualitative analysis of our study, Figure 11 provides a more specific delineation of how the responses are divided within OT and PT disciplines. Figure 11 is organized by the themes, or parent codes, of the responses, highest level of education, and frequency of said code in accordance with the degree of education. We inquired about the highest level of education attainment as a way to gain survey participant demographics, but still respected privacy and observed anonymity throughout our study.

**Figure 11**

*Results of Qualitative Data and Parent Codes by Highest Degree of Education*

Descriptor Matrix	Codes												
	Communicating clearly	Active listening	Client Response to Therapy	Autonomy and Self-Advocacy	Non-Compliant Behavior	Accommodations & Modifications	Providing Options	No Effective Accommodations	Environmental Modifications	Patient/Caregiver Education	Social Environment	Therapist Service Competency	Providing Appropriate Intervention
Master's Degree	7	7	2	5	1	3	1	4	2			4	2
Bachelor's Degree	6	2	3	2	1	4	5	4	1		1	5	5
PHD or Doctorate Degree	9	6	2	2	4	8	3	5	6	2	1	4	7
Associate Degree	4	2		2		4		1	2			1	1

**Figure 12**

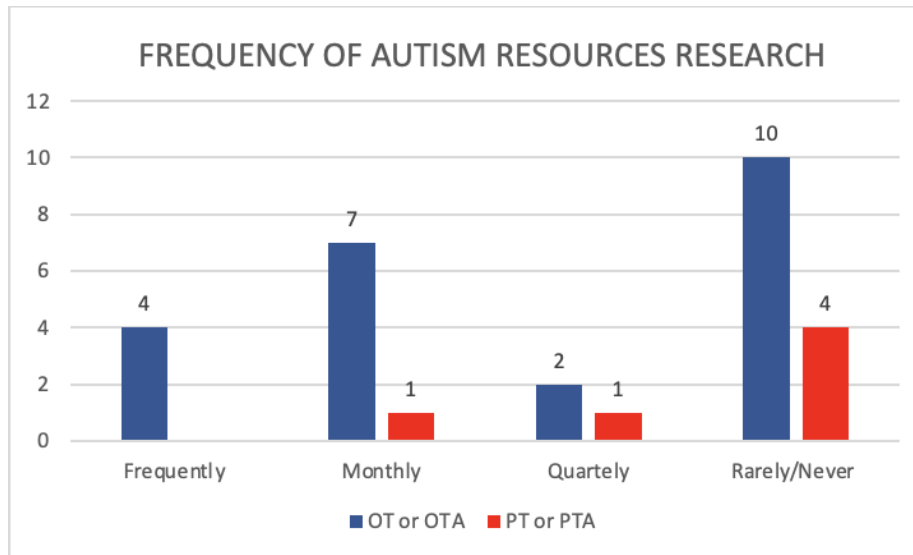
*Results of Qualitative Data and Parent Codes by Professional Title*

Descriptor Matrix	Codes												
	Communicating clearly	Active listening	Client Response to Therapy	Autonomy and Self-Advocacy	Non-Compliant Behavior	Accommodations & Modifications	Providing Options	No Effective Accommodations	Environmental Modifications	Patient/Caregiver Education	Social Environment	Therapist Service Competency	Providing Appropriate Intervention
OT or OTA	19	16	6	10	6	11	8	9	8	2	1	12	14
PT or PTA	7	1	1	1		8	1	5	3		1	2	1

When indicating the frequency of how often participants research relevant autism resources, the majority of both OT practitioners and PT practitioners' responses were rarely/never. Figure 13 demonstrates the comparative graph of OT and PT practitioner frequencies.

**Figure 13**

*Results of Frequency of Autism Resources Research by Professional Title*



### Discussion

A majority of our participants reported they interact with autistic older adults was mainly through a clinical job for the majority of our participants, whether it was through treating a patient or working alongside a coworker. A significant difference was found between OT and PT practitioners in the exposure of working with autistic older adults, as shown by Figure 7, that PT practitioners had much less exposure to working with autistic older adults, especially considering the number of PTs that participated in our survey. While more OTs reported being acquainted with someone with autism, PTs reported interactions that were more concentrated between acquaintances and clinical jobs. Our data suggests that the PT practitioners mainly rely on other professionals and reference past school curriculums to support their understanding of autism. The PT practitioners reported that the maximum number of experiences working with autistic older adults is 1–5 years. This suggests that OTs were exposed to working with autistic older adults because of the variety of settings that the OTs were working in, although there was an

overlap in settings between the two professions. The difference in setting variety could be justified by the small number of PT participants that were collected in the survey.

The results also suggest that OT practitioners have much higher confidence rates when asked to work with autistic older adults. Healthcare professionals who demonstrate confidence while working with their patients tend to yield better results when working with the patients (Morris et al., 2019). Although most of the OT practitioners reported being somewhat confident, moderately confident, and fairly confident, the OTs still reported higher results about being prepared to work with autistic older adults. The confidence levels reported can be explained by reported years of experience. The OT practitioners that are exposed to autistic older adults for a longer period of time correlate with more confidence and clinical experience. This study supports that the years of experience can impact the level of confidence when working with autistic older adults.

One intriguing finding was that most of the participants, including both OT and PT practitioners, reported that their experience working with autistic older adults was accumulated after their professional schooling. Most participants reported that their training and knowledge were gained by workshops, reading journal articles, continuing education courses, and experience past the school curriculum. As the results have found, the participants were gaining experience working with this population on their own time or in the field. Participants who have one year of experience or less may have obtained such experience during their academic careers, such as fulfilling fieldwork rotation requirements. There is a lack of current research on this population for practitioners to explore and apply to their evidence-based practice. This study suggests that including clinical training for working with autistic older adults can be beneficial for the healthcare

practitioners to help boost the practitioners' levels of confidence, which can possibly impact the success of the treatment. For example, annual training about patient education on environmental adaptations can prepare clinicians with how to react and interact with clients in response to environmental context changes. Providing additional training sessions for healthcare professionals will give them the confidence to assess environmental factors. Having the knowledge and confidence to work with a certain population can affect the intervention plan and planning for treatment.

The qualitative portion of the survey showed that communication is a common difficulty when interacting with autistic older adults. OT and PT practitioners reported having difficulties communicating with the patients, although our results showed that respondents who had a professional doctorate degree or a PhD reported having higher confidence in communication with autistic older adults. This issue consists of three different factors. The first was the practitioners were unable to understand what the patients were trying to express. The second factor was the patients not being able to understand the information delivered by the practitioners. The last factor contributed to having communication problems with other healthcare professionals, where some responses suggested that other practitioners should be more understanding of this population or needing to listen to their needs. The findings in represented in Figure 12 support the conclusion that OT practitioners were more confident in their communication with autistic older adults. These results may be interpreted because of the emphasis of therapeutic use of self during schooling for occupational therapists. However, the results might also be skewed towards OT practitioners because of the larger OT sample that was collected.

A common theme that was found was having accommodations and modifications. The respondents reported that having some modifications to the environment can greatly impact the autistic older adults' performance skills. The respondents stated that accommodations like having headphones, weighted blankets, adjusting the lighting, or limiting distractions helped the patients engage in the session and made them more comfortable if there was an unexpected change in the routine or the environment. These responses tie in to the third parent code that was identified – autonomy and self-advocacy. The respondents found it very important that the autistic older adults need to speak up about their needs. The practitioners indicated that this population should be urged to communicate any accommodations or modifications needed to help boost their performance and engagement levels. The results show that OTs were much more confident in urging patients to self-advocate about their needs.

The final common theme that was evident among both disciplines' responses was therapist service competency. Commonalities within the responses included lack of therapist training, appropriate use of therapeutic interventions and patient/caregiver education. The respondents reported that therapist knowledge and service competency have a significant impact when providing quality care to older autistic adults. Respondents also report that this includes communicating clearly with the multidisciplinary team and can ensure mutual understanding of care. The final child code under this theme is patient/caregiver education. Patient/caregiver education leads to better patient satisfaction and an increase of compliance during treatment.

### **Limitations**

There are several limitations to our research study. For one, this study drew from a limited sample and needed to be revised from a grand study to a pilot study. This was due to a lack of time and resources since we only surveyed U.S. practitioners in occupational therapy and physical therapy. We hoped to gather more participants for our study, but we overestimated the number of practitioners having experience working with autistic adults. This limitation allowed us to collect from a pool of occupational and physical therapy practitioners only, with the exception of the physician that was later excluded from our results. Another limitation for our specific occupational therapy and physical therapy practitioners can be explained by the fact that we were limited to only post mainly on occupational therapy and physical therapy online forums. These forums receive an influx of requests, so our survey may have been overlooked among the other surveys posted daily. We also reached out to several autism networks, but most required approval for questionnaires to be submitted to their networks. Because of the timely process and limited data collection period, those networks were unable to answer the survey before our deadline. We were ultimately only able to recruit participants through word of mouth. Secondly, the research data is slightly skewed because most participants have worked in either a skilled nursing facility or hospital setting. Our thesis advisor, Dr. Bill Wong, presents a bias because he is both an autistic individual and occupational therapy practitioner.

Further limitations exist that practitioners may be unaware that they are working with autistic older adults. For instance, nurses or physicians may treat autistic patients for cerebrovascular accidents but may overlook autism diagnoses. This limits the population



of participants to practitioners who are aware of autism diagnoses in their patients and are interested in working with our targeted population. They may be unaware of the patient's diagnosis due to the patient being self-identified and not medically diagnosed by a physician. Additionally, some participants did not understand the final question of the survey. This resulted in a lack of responses for the final question of the survey which we were unable to extract parent codes from. A final limitation is that we cannot verify where the practitioners are located. The aim of the study is to be nationwide, but most participants are local to California.

### **Future Implications and Application to Occupational Therapy**

This study provides a direction for future healthcare practitioners working with autistic older adults. As a participatory study approach, it prioritizes co-construction research through the partnership with health care professionals. A participatory study approach emphasizes the importance of participating in research studies to gather more information in efforts to improve the quality of care of patients. In a larger scheme, health care practitioners should make a greater effort for participatory research as it aims to integrate knowledge and scrutinize current themes to promote change within a population. The data collected in the survey aids in the understanding of the knowledge sought after and acquired by healthcare professionals. Based on the answers, workplaces can coordinate groups and lectures to better inform and educate employees of how to interact with autistic older adults, enhance therapeutic relationships, and safeguard overall health and well-being.

This pilot study attempts to shed light about the need for more research pertaining to the autistic adult population. Multidisciplinary training can be a useful strategy to

address the challenges that health care practitioners face when treating this population. Ready-to-use clinical resources and online content can be useful for these practitioners (Mahoney et al., 2019). It can create future avenues for researchers and future students in masters and doctorate programs to engage in participatory research. Future research can target more participants across different disciplines to help healthcare practitioners better serve the older autistic adult population.

### References

- Center for Disease Control and Prevention (2020). *Data and statistics on autism spectrum disorder*. <https://www.cdc.gov/ncbddd/autism/data.html>
- Cole, M. B., & Tufano, R. (2020). *Applied theories in occupational therapy: A practical approach* (2<sup>nd</sup> ed.). SLACK Incorporated
- Duchinsky, E. (2017). *Autism care costs: Healthcare's perfect storm*. Behavioral Health & Medical Healthcare Solutions Inc. <https://bhmpc.com/2017/08/autism-care-costs-healthcares-storm/>
- Fombonne, E. (2012). Autism in adult life. *The Canadian Journal of Psychiatry*, 57(5), 273-274. <https://doi.org/10.1177/070674371205700501>
- Hand, B. N., Angell, A. M., Harris, L., & Carpenter, L. A. (2020). Prevalence of physical and mental health conditions in medicare-enrolled, autistic older adults. *Autism: The International Journal of Research and Practice*, 24(3), 755–764. <https://doi.org/10.1177/1362361319890793>
- Kenny, L., Hattersley, C., Molins, B., Buckley, C., Povey, C., & Pellicano, E. (2015). Which terms should be used to describe autism? Perspectives from the UK autism community. *Autism*, 20(4), 442-462. <https://doi.org/10.1177/1362361315588200>
- Law, M., Cooper, B., Strong, S., Stewart, D., Rigby P., & Lettis, L., (1996). The person- environment-occupation model: A transactive approach to occupational performance. *Canadian Journal of Occupational Therapy*, 63(1), 9-23. <https://doi.org/10.1177/000841749606300103>
- Mahoney, W. J., Ceballos, J., & Amir, N. (2019). Occupational therapy practitioners' perceptions about older adults with developmental disabilities in traditional health

care settings. *American Journal of Occupational Therapy*, 73(3), 1–6.

<https://doi.org/10.5014/ajot.2019.029835>

Morris, R., Greenblatt, A., & Saini, M. (2019). Healthcare providers' experiences with autism: A scoping review. *Journal of Autism and Developmental Disorders*, 49(6), 2374–2388. <https://doi.org/10.1007/s10803-019-03912-6>

Nicolaidis, C., Raymaker, D. M., Ashkenazy, E., McDonald, K. E., Dern, S., Baggs, A. E., Kapp, S. K., Weiner, M., & Boisclair, W. C. (2015). "Respect the way I need to communicate with you": Healthcare experiences of adults on the autism spectrum. *Autism The International Journal of Research and Practice*, 19(7), 824–831. <https://doi.org/10.1177/1362361315576221>

Ohl, A., Schelly, D., Brown, D., Schulze, N., Smith, M., & Davies, B. (2020). A survey of occupational therapy services provided for adults with autism spectrum disorder. *The Open Journal of Occupational Therapy*, 8(2), 1-13. <https://doi.org/10.15453/2168-6408.1620>

Perkins, E. A. & Berkman, K. A. (2012). Into the known: Aging with autism spectrum disorders. *American Journal on Intellectual and Developmental Disabilities*, 117(6), 478-496. <https://doi.org/10.1352/1944-7558-117.6.478>

Roestorf, A., Bowler, D. M., Deserno, M. K., Howlin, P., Klinger, L., McConachie, H., Parr, J. R., Powell, P., Van Heijst, B. F. C., & Geurts, H. M. (2019). "Older adults with ASD: The consequences of aging" Insights from a series of special interest group meetings held at the International Society for Autism Research 2016–2017. *Research in Autism Spectrum Disorders*, 63, 3–12. <https://doi.org/10.1016/j.rasd.2018.08.007>

- Rydzewska, E., Hughes-McCormack, L. A., Gillberg, C., Henderson, A., MacIntyre, C., Rintoul, J., & Cooper, S.-A. (2019). General health of adults with autism spectrum disorders—A whole country population cross-sectional study. *Research in Autism Spectrum Disorders, 60*, 59–66.  
<https://doi.org/10.1016/j.rasd.2019.01.004>
- Shooshtari, S., Naghipur, S., & Zhang, J. (2012). Unmet healthcare and social services needs of older Canadian adults with developmental disabilities. *Journal of Policy and Practice in Intellectual Disabilities, 9*(2), 81–91.  
<https://doi.org/10.1111/j.1741-1130.2012.00346.x>
- Stewart, G. R., Corbett, A., Ballard, C., Creese, B., Aarsland, D., Hampshire, A., Charlton, R. A., & Happé, F. (2020). The mental and physical health of older adults with a genetic predisposition for autism. *Autism Research, 13*(4), 641–654.  
<https://doi.org/10.1002/aur.227>
- Vaughn, L. M., & Jacquez, F. (2020). Participatory research methods- Choice points in the research process. *Journal of Participatory Research Methods, 1*(1).  
<https://doi.org/10.35844/001c.13244>
- Wise, E. A., Smith, M. D., & Rabins, P. V. (2019). Correlates of daily functioning in older adults with autism spectrum disorder. *Aging & Mental Health, 24*(10), 1754-1762. <https://doi.org/10.1080/13607863.2019.1647138>
- Zerbo, O., Massolo, M. L., Qian, Y., & Croen, L. A. (2015). A study of physician knowledge and experience with autism in adults in a large integrated healthcare system. *Journal of Autism and Developmental Disorders, 45*(12), 4002–4014.  
<https://doi.org/10.1007/s10803-015-2579-2>

**Appendix A****USA-Australia Cross Cultural Research Guide***Licensed/Certified Professionals (Inclusion Criteria)*

USA	Australia (Equivalent)
Physical Therapist	Physiotherapist (registered)
Physical Therapy Assistant	
Occupational Therapist	Occupational Therapist (registered)
Occupational Therapy Assistant	
Dietitian	(same)
Social Worker	(same)
Speech Pathologist	(same)
Registered Nurse	Nursing
Respiratory Therapist	
Activities Director	Recreation Therapist
Music Therapist	(same)
Licensed Practical Nurse/Licensed Vocational Nurse	Nursing
Admissions Director	(same)
MDS nurse	Nursing

**Exclusion Criteria**

1. Licensed applicants at the time of survey (OTLA, OTALA, PTLA, PTALA, SLP-CF)- to make things simple, these are folks who are transitioning to be licensed professionals.
2. Dietary aide
3. Activities Aide/Assistant
4. Rehab Aide/Allied health assistant
5. Housekeeping personnel
6. Maintenance personnel
7. CNA/RNA
8. Private caregivers hired by family

## Appendix B

### Survey Questions

1. What is your professional title? (Occupational therapist, physical therapist etc.)
    1. Dietitian
    2. Nurse
    3. OT or COTA
    4. PT or PTA
    5. Physician
    6. SLP
    7. Other: \_\_\_\_\_ (write in option)
  2. Highest level of education?
    1. Associate Degree
    2. Bachelor's Degree
    3. Master's Degree
    4. PHD or Doctorate Degree
  3. What setting do you work in? (Outpatient, hospital, SNF, long term care, etc.)- **Select all that apply**
    1. Assisted living facility
    2. Community health
    3. Group home
    4. Hand therapy
    5. Home health
    6. Hospital (inpatient or outpatient)
    7. Independent living facility
    8. Mental health
    9. Nursing home/ Skilled nursing facility
    10. Outpatient clinic
    11. Other: \_\_\_\_\_ (write in option)
  4. How many years of experience do you have working with OLDER ADULTS?
    - a. Less than 1 year
    - b. 1-5 years
    - c. 6-10 years
    - d. 10-15 years
    - e. 16-20 years
    - f. More than 20 years
5. Do you have experience working with AUTISTIC OLDER ADULTS? (for the context of this survey, we define older adults as any individuals over 50 years old)
- |                 |                          |
|-----------------|--------------------------|
| YES             | NO                       |
| ↓               | ↓                        |
| Continue survey | Thank you for your time! |
6. What are your personal experiences with AUTISTIC OLDER ADULTS?  
**Select all** that apply.
    - A. clinical job
    - B. caregiver of a family member or a friend

- C. formally diagnosed as autistic
- D. an acquaintance who is autistic.

7. For each of the responses you selected, please write in how many years of experience you have working with OLDER AUTISTIC ADULTS?

- a. Less than 1 year
- b. 1-5 years
- c. 6-10 years
- d. 10-15 years
- e. 16-20 years
- f. More than 20 years

8. How prepared by your training do you feel to work with autistic older adults?

- 1. Not confident
- 2. Somewhat confident
- 3. Fairly
- 4. Moderately
- 5. Very confident

9. Tell me about the autism training you received during school and/or at your workplace.

Select all that apply:

- Past school curriculum
- Continuing education or professional development courses
- Departmental in-service
- Reading peer-reviewed journal articles
- Webinar
- Workshop
- Other professionals
- Other: \_\_\_\_\_

**For the context of the following questions, please respond based on your interactions with older autistic adults.**

For the following questions please rate your confidence level on a scale from 1 to 5:

- 1= not confident
- 2=somewhat confident
- 3= fairly confident
- 4=moderately confident
- 5=very confident

I feel confident that I...

10. Make the patient feel that I am genuinely interested in knowing what he/she thinks about his/her situation

- 11. Make the patient feel that I have time to listen
- 12. Recognize the patient's thoughts and feelings
- 13. Be attentive and responsive
- 14. Be aware of when the patient is scared or concerned
- 15. Treat the patient in a caring manner



16. Make the patient experience me as empathetic
17. Make the patient feel that he/she can talk with me about confidential, personal issues
18. Focus on compassion, care and symptomatic treatment, when there is no curative treatment
19. Reach agreement with the patient about the treatment plan to be implemented
20. Advise and support the patient in making decisions about his/her treatment
21. Ensure that the patient makes his/her decisions on an informed basis
22. Explain things so that the patient feels well-informed
23. Explain how the treatment plan works or is expected to work so that the patient understands them
24. Be aware of when my own feelings affect my communication with the patient
25. Deal with my own emotional reactions when the situation is difficult for me
26. To maintain the relationship with the patient when he/she is noncompliant
27. To provide services appropriate to the client's needs

Please answer the following questions to the best of your abilities.

28. What difficulties do you face when interacting with autistic older adults?
29. How do you support autistic older adults when there are temporary or permanent changes to their environment? (e.g., room changes, roommate changes, items stolen/misplaced, alarm testing, etc.) if they are not allowed to not have a private room.
30. In what ways do you support your patients to advocate for their own needs? (e.g., asking for alternative menu items if they do not like what is on the main menu)
31. How often do you explore relevant autism resources and meet with other members of the healthcare team to share new factual information that would dispel incorrect or outdated perceptions regarding this population? (e.g. weekly, monthly, every 3 months, etc.)
32. Do you have any accommodations in your healthcare toolkit that you find to be effective when delivering your services? If so, please briefly explain

**Appendix C****Institutional Review Board Approval**

Re: IRB Application Number MSOT10-07

04/07/2021

Dear Dr. Wong and Research Team,

The Stanbridge University Institutional Review Board has completed a review of your application entitled "Healthcare Practitioners' Self Efficacy Working with Autistic Older Adults." Your research protocol MSOT10-07 is fully approved and categorized as exempt.

Should you wish to modify this approved protocol, please submit a modification request.

Sincerely,

*Dominique N. Wascher*

Dominique N. Wascher, Ph.D.  
IRB Chair

Dear Dr. Wong,

Your modification request has been approved.

IRB Application Number	MSOT10-07
Date	05/19/2021
Level of Review	Exempt
Application Approved	X
Conditional Approval	
Not approved	
Modification Approved	X