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THE EXPERIENCES THAT PROMOTE SUCCESS FOR STUDENTS WITH
INTELLECTUAL DISABILITY IN POSTSECONDARY EDUCATION

A dissertation submitted in partial fulfillment of the requirements for the degree of Doctor of
Philosophy at Virginia Commonwealth University.

By
Kimberly Sunshine Handsome
Master of Teaching, Virginia Commonwealth University, 2006
Bachelor of Arts, Virginia Commonwealth University, 2005

Director: Colleen A. Thoma, Ph.D.
Professor & Associate Dean, Academic Affairs and Graduate Studies
Virginia Commonwealth University
Richmond, Virginia

November, 2018

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Dedication

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Abstract

THE EXPERIENCES THAT PROMOTE SUCCESS FOR STUDENTS WITH INTELLECTUAL DISABILITY IN POSTSECONDARY EDUCATION

By Kimberly Sunshine Handsome, Ph.D.

A dissertation submitted in partial fulfillment of the requirements for the degree of Doctor of Philosophy at Virginia Commonwealth University.

Virginia Commonwealth University, 2018

Director: Colleen A. Thoma, Ph.D., Professor and Associate Dean

Academic Affairs and Graduate Studies

This in-depth qualitative, phenomenological (Smith & Fowler, 2009) research study attempted to understand the experiences of young adults with intellectual disability who had completed a 2-year, inclusive postsecondary education program. 13 participants (4 former students with ID, 5 parents, and 4 Postsecondary Education staff members) participated in semi-structured interviews. Interviews were coded to provide themes amongst each individual group of participants. A document review was also conducted to better understand the program components and add validity to self-reports from interviews. Results were analyzed and used to provide implications for future research and program development.

Keywords: Intellectual Disability, Postsecondary Education, Supports, Experience(s)

Chapter I Introduction

Background

Students with disabilities, more specifically those with intellectual disability (ID), continue to fall behind their same age peers in regards to postsecondary education (PSE) enrollment and accessibility (Baum & Ma, 2007; Blackorby & Wagner, 1996; Grigal, Hart, & Migliore, 2011; Neubert, Moon, Grigal, & Redd, 2001). For over a decade, the lack of enrollment in postsecondary programs has been viewed as one factor that contributes to higher unemployment rates, lower wages, and community and peer isolation for those students with ID (National Longitudinal Transition Study-2, 2009; National Longitudinal Transition Study-2, 2011). Although transition has been a focus in the field of special education for over thirty years (Carter et al., 2013; www.thinkcollege.net, May 2012), there has still been a slow progression in regards to transition outcomes for students with ID. The recent development of postsecondary education programs on college campuses for students with ID has been an attempt to improve transition outcomes based on the success of postsecondary education improving outcomes for other groups of young adults with and without disabilities. Although students with ID are accessing postsecondary education, more research still needs to be done to determine whether this opportunity does indeed help to improve long-term outcomes for young adults with ID. (Grigal, Hart, & Migliore, 2011; Shaw & Dukes, 2013).

Students with Intellectual Disability

Postsecondary education improves the long-term economic benefits, health, quality of life, community participation, independence, self-esteem, friendships, and professional relationships of person's with and without disabilities (Baum & Ma, 2007; McMahon, 2009; National Center for Educational Statistics, 2006). deFur and Korinek (2008) also note that those who are included in PSE are more likely to develop and possess the necessary skills for lifelong career development, learning, community participation, employment, and overall quality of life. Unfortunately persons with disabilities, specifically those with an ID (ID), in the past have not experienced these benefits due to the lack of access to and participation in postsecondary education (deFur & Korinek, 2008). They have also been seen to have the worst post-school outcomes (i.e., lower wages, less skilled jobs, high poverty rates) when compared to their same-aged peers (Blackorby & Wagner, 1996; Neubert, Moon, Grigal, & Redd, 2001; Stodden & Dowrick, 2000; Wagner, Cameto, & Newman, 2003).

Postsecondary Education Options

Recently in the field of special education, there has been a focus on PSE for students with ID at colleges and universities across the United States. Much of this focus came from the reauthorization of the Individuals with Disabilities Education Act 2004 (IDEIA; PL 108-446), which established that students with disabilities participate in transition services that lead to postsecondary education and employment (Plotner & Marshall, 2014).

The drive for more inclusive PSE options for students with ID came from “the early grassroots efforts of institutions of higher education, local education agencies, and families (Grigal, Hart, & Lewis, 2010, p.26). These groups of people have not only been on the forefront of the creation and implementation of programs for students with ID, but they have been the

voices that foster change in policy within federal, state, and local governments. The Higher Education Opportunity Act (P.L. 11-315; HEOA) is one of the most influential laws that has helped put into place provisions for PSE for students with ID. Of most importance are the provisions that address financial aid, the creation of a new model demonstration program, and a coordinating center for PSE programs serving students with ID (Lee, 2009).

Currently, there are close to 262 PSE programs for students with ID (www.thinkcollege.net, November 2018), with a range of inclusive opportunities. These programs are usually categorized into three specific frameworks, (mixed/hybrid, substantially separate, and inclusive individual supports) which help to define the supports that are given to students within their specific program (Grigal, Hart, & Lewis, 2010; Hart, Grigal, Sax, Martinez, & Will, 2006; Hart, Mele-McCarthy, Pasternack, Zimbrich, & Parker, 2004; Theoharis, Ashby, & Decloutte, 2009). However, it is important to note that these frameworks for PSE programs are broad categories and simply help in the description of such programs; they are not prescriptive in specific qualities that programs must possess (Grigal & Hart, 2010). Another area that helps to define the framework in which programs will fall into is the funding source through which the program initially started from and how the funding is used.

Laws and Policies

The laws that support PSE and the system they encompass create a number of pitfalls for students and their families when seeking educational support for PSE. The differences in the laws regarding K-12 education and PSE often come as a shock for students with disabilities and their families (Garrison-Wade & Lehmann, 2009; Gil, 2007). P.L. 94-142 Education of All Handicapped Children Act in 1975, also known as the Individuals with Disabilities Education Improvement Act Amendments of 2004 (IDEIA), states that a Free and Appropriate Education

(FAPE) is guaranteed to all children, including those with disabilities, until they reach the age of 18 – 22 (Lee, 2004, Memorandum to State Directors), depending on what their specific state allows (VanBergeijk, Klin, & Volkmar, 2008). Not only does FAPE fall under IDEIA, but the supports that students often benefit from are included as well. Upon students aging out or exiting the public school system, the supports that students receive should they choose to continue their education, then fall under Section 504 of the Rehabilitation Act of 1973. Section 504 governs the types of supports (i.e., academic accommodations) that students with disabilities have access to in order to complete their PSE goals. The change in the academic setting and the types of services provided, often lead to students needing to take more of a lead in the advocacy of their needs (Garrison-Wade & Lehmann, 2009).

Age of majority is another regulation within IDEIA that causes some confusion for parents and students. The specific age of majority or transfer of rights varies from state to state with a range being from the age of 18 to the age of 21 (IDEA; sec. 300.520). This regulation states that all educational rights of the student transfer from the parent/guardian to the student upon reaching the age of majority as determined by the state they live in at the time. Students now become the primary agent in requesting services needed to support them in the educational environment. If they do not advocate for their needs, they may not receive the necessary accommodations and supports. Students are responsible for contacting the disability support services office at their postsecondary institution, as well as notifying each of their instructors or professors of the accommodations and supports that they require and have been approved to use (Stodden, Jones, & Chang, 2002; Wolanin & Steele, 2004). For students with ID, this may be a more difficult task for which to prepare them. Often, students with ID have accommodations and modifications built into their classroom or educational environment within the K-12 setting. For

example, directions are often read aloud to the class as a whole and several prompts are given during a task. For those not familiar with a student's specific daily schedule and classroom make-up while in the K-12 environment, those accommodations and modifications may not be noticeable or identified as such. It is imperative that students with ID have access to and receive the necessary accommodations and supports. Supports and accommodations have been linked to success in PSE programs for students with disabilities (Mull, Sitlington, & Alper, 2001; Pierangelo & Crane, 1997; Stodden & Dowrick, 2000; Stodden, Jones, & Chang, 2002).

Within PSE, specific accommodations and modifications are rarely guaranteed or built-in to the classroom or curriculum. This is one of the reasons why self-determination and advocacy skills are important for students to understand and acquire during their K-12 education. It also supports the need for researchers to begin looking at data regarding the supports that are necessary for students with ID to be successful in PSE environments and how those supports should be implemented. Research is needed to investigate the supports used across the different models of PSE programs for students with ID (both built-in as well as selected for individual students or groups of students). In addition, research should include the students' role in accessing necessary supports and accommodations and the impact these supports and accommodations have on their success, retention and completion of PSE programs.

The Higher Education Opportunity Act (HEOA; P.L. 110-315) was passed on August 14, 2008 and it reauthorized the Higher Education Act of 1965. With the enactment of this law came numerous new provisions that help to improve access to PSE for students with ID (Grigal & Hart, 2010; Lee, 2009; Shanley, 2010; Thompson, Weir, & Ashmore, 2011; VanBergeijk, 2011). For the first time, the HEOA allows students with ID to be eligible for Pell Grants, Supplemental Educational Opportunity Grants and the Federal Work Study Program. In previous years,

students with ID were not eligible to receive such assistance because they did not meet specific criteria, like holding a typical high school diploma, passing an ability to benefit test, or not being accepted into a college/university degree program. Many students with ID are tracked into a specialized curriculum that involves fewer rigors than that of a general education program during their K-12 education (Gaumer, Morningstar, & Clark, 2004; Paiewonsky & Ostergard, 2010). The students with ID are held to the competencies of an aligned standard based on the general education curriculum (NCLB, 2001), which they are often not exposed to. Without exposure to the general education curriculum of which the aligned standards are based on, how can students be expected to perform to the best of their abilities? This is a question that has been raised for years, as well as one that has helped to support the inclusion movement.

In order for students with ID to be eligible to receive financial assistance for PSE they must be enrolled or accepted in a comprehensive transition and postsecondary program at an institution of higher education (IHE); and be maintaining satisfactory progress in the program as determined by the institution (Title IV, Part G, Section 485 (a) (8) (s)). These requirements are often hard for students to achieve because of the lack of exposure to the general education curriculum within their K-12 education. Not only are they lacking the academic requirements, but the social and unwritten expectations of society are also areas in which students with ID struggle when compared with their peers without disabilities in the PSE setting.

Due to the lack of general education inclusion, exposure, and gaining of course credits, students with ID are often granted an alternate type of high school diploma. Many times, this diploma is a statement that a student has participated in the high school curriculum, but has not met all the requirements for full graduation. Johnson & Thurlow (2003) completed a national study on the graduation requirements and diploma options for students with disabilities in

response to one portion of NCLB 2001 (Section 1111(b)(2)(c)(vi)) requirement that graduation rates be tied to school districts determination of making adequate yearly progress (AYP). They found that twelve states offered IEP/Special Education Diplomas, most of which were awarded to students with more significant disabilities, such as ID.

The HEOA is most known for creating greater access to financial resources for students with ID that choose to attend PSE programs, however, it has also opened the door for model demonstration programs and a national Coordinating Center (CC) for Transition and Postsecondary Programs for Students with Intellectual disability (TPSID). In October 2010, 27 five-year grants were awarded to TPSIDs across the United States (Shanley, 2010). These programs are responsible for creating and implementing PSE programs that support students with ID through academics, social interaction, employment skills, and independent living strategies. The national CC, located at The Institute for Community Inclusion at the University of Massachusetts Boston, is responsible for: (a) developing and implementing an evaluation protocol that will collect data on student outcomes and program strengths, (b) the dissemination of information regarding data collection tools, protocols, data collection, and literature regarding PSE for students with ID, (c) providing training and technical assistance for TPSIDs, and (d) the promotion of collaborative efforts amongst TPSIDs and other programs that are currently or aim to serve students with ID in PSE (Think College: Coordinating Center for Transition and Postsecondary Programs for Students with Intellectual disability Abstract, n.d.).

While the HEOA has increased access to postsecondary education for students with ID and helped programs to receive the most support, there are still other federal laws and mandates that have helped lay the framework for inclusion in and access to PSE. Those laws are further discussed below in relation to the impact they have had on PSE for students with ID.

The Rehabilitation Act of 1973 was reauthorized under the Workforce Investment Act (WIA; PL 105-220). With this reauthorization, vocational rehabilitation (VR) services were updated and clarified to include the requirement of VR counselors to participate in the transition planning of students with disabilities that are receiving specialized services under IDEIA, even if only on a consultative basis (National Council on Disability, 2008). One of the services that VR agencies can provide is funding for postsecondary education. Postsecondary education can be included as a service in the Individual Plan for Employment (IPE) that is created by the VR agency. Within such IPEs, VR agencies can state that they will provide the funding for a student to participate in a PSE program, as research has shown that those who participate in PSE have increased financial and employment outcomes (Grigal & Dwyre, 2010). Unfortunately, this resource is often underutilized by VR counselors and agencies (Grigal & Hart, 2010; Izzo, 2010). The lack of providing supports to students with disabilities for PSE may be due to the decrease in funding for VR agencies, which has caused waiting lists to be enacted (National Council on Disability, 2008).

In 2014 WIA was reauthorized and became known as the Workforce Innovation and Opportunity Act (WIOA; PL. 113-128). With the reauthorization, amendments were also made to the Rehabilitation Act of 1973. WIOA puts a greater emphasis on competitive employment and appropriate transition services for students with disabilities. It also emphasizes the need for service coordination between vocational rehabilitation agencies, school systems, and other supporting agencies as appropriate. WIOA added a new section to the Rehabilitation Act in which it requires each state to provide or arrange “pre-employment transition services for all students with disabilities” (“WIOA: What it means”, p. 5, n.d.). These services could include internships, transition counseling, workplace readiness skills, self-advocacy training, job

exploration, etc. WIOA has also expanded the definition of the characteristics of students with disabilities who are eligible to receive VR services from those with just significant disabilities to those who are aged 14-24 and meet a broader spectrum of criteria. Many of these changes and updates have the potential to affect the access to PSE for students with ID.

Families of students with disabilities, specifically those with ID, are often one of the strongest pieces of the support system for students with disabilities. Due to The Family Educational Rights and Privacy Act of 1974 (FERPA; PL 93-380) regulations, this support system is often tested when a student turns 18 years of age or begins attending a postsecondary institution. Under FERPA, all students are given the rights to their educational records upon turning 18 years of age or enrolling in a postsecondary institution (regardless of age) (34 CFR § 99.5). This also applies to students who are participating in high school courses and university courses simultaneously, otherwise known as dual enrollment (Karp, Calcagno, Hughes, Jeong, & Bailey, 2007). Prior to turning 18 years of age or enrolling in a postsecondary institution, parents and/or guardians have the legal right to make educational decisions and obtain educational records regarding their student. They are often the advocates and decision makers for their students and their education. For many parents, the change from making the educational decisions to having no access can be alarming. Once 18 or enrolled in PSE, students must give written consent for anyone (i.e. parents, guardian, sibling, instructors) to have access or receive information regarding their educational progress or academic records (PL 93-380). The idea of written consent can be new for both students and family members, especially when the student is unable to fully understand or comprehend written material without assistive technologies or help from a trusted adult. This is an example of where Section 508 of the Rehabilitation Act of 1973 plays out in real terms.

FERPA also impacts the amount of information disclosed to faculty and staff about a student's disability information (34 CFR § 99.31). This includes questions that an instructor may have regarding accommodations that students need in order to be successful (Barr, Hartman, & Spillane, 1995; PL 93-380). The need for written consent from the student regarding their disability and necessary accommodations and supports, leads to the importance of self-determination instruction and training prior to enrollment in postsecondary education. This is especially important for students with ID because their disabilities are often more severe than what instructors have been exposed to in the past. While it is imperative that students receive the proper instruction on self-advocacy and self-determination prior to enrolling in PSE, it is equally important for the instructors within IHE to receive the proper training on how to best support students with ID in their classrooms.

In December 2015, the President signed into law the Every Student Succeeds Act (ESSA; PL. 114-95), which replaces the No Child Left Behind Act (NCLB; PL. 107-110). The ESSA has a focus on "fully preparing all students for success in college and careers." ("Every Student Succeeds Act", n.d.). It still unknown as to how this law will impact PSE for students with ID, but it is anticipated that it will have some long term impact.

All of these laws have helped to support the need for a seamless transition and access to higher education or continuing education for students with ID. However, it is important to remember that the laws and policies are just the beginning. Currently there are not any laws in place that specifically mandate that students with ID receive or have access to PSE. Many of the programs that are currently in place are funded through grant projects by the federal government. Without the outcomes of PSE programs for students with ID being available, these programs may be under the microscope when discussing how money could be better spent. In order to

protect the loss or cut of PSE programs for students with ID, advocates, those working in the field, and researchers must continue to push the need for legislation specific to PSE for students with ID.

Current Issues

The number of PSE programs for students with ID has increased over the past five years, as well as the amount of descriptive research regarding the make-up of PSE programs. However, there is little outcome based research that shows the outcomes of the various programs and supports the components that help to make such programs successful (Thoma et al., 2011). One component that could arguably make a difference in the quality of PSE programs for students with ID is research that looks directly at specific supports provided to students with ID and how those supports influence or affect student outcomes. Research shows that supports such as self-determination (Garrison-Wade & Lehmann, 2009; Getzel & Thoma, 2008; Gill, 2007; Jameson, 2007; Thoma & Wehmeyer, 2005; Webb et al., 2008) and academic accommodations (Hadley, 2007; Webb et al., 2008) are critical to support the success of students with disabilities (not ID) in PSE settings, as well as the success of students with ID in secondary settings. Even with the growth and expansion of PSE opportunities for students with ID, the supports specific to the success of those students is still an area in which there is an absence of outcome based research. While research studies and literature reviews over the past 10 years have discussed the needs (specifically supports) of students with disabilities (e.g., emotional behavioral disorders, learning disabilities, attention deficit disorder, etc.) who chose to pursue postsecondary education (Webb et al., 2008), there is still an absence of research regarding the needs of students with ID. This gap within the literature supports the need for researchers to take the next step and begin

investigating specific supports for students with ID that promote success in PSE and help them to achieve their post school goals.

Although there is a lack of outcome-based data, there is still research being conducted in regards to PSE for students with ID. Review of the literature featured on the Think College database and other well-known educational data bases (ERIC, Education Research Complete) shows current research consists of exploratory, descriptive, qualitative, single subject and some case studies which document program components, student and faculty experiences, and recommendations for future practices. Due to the early stages of many of these PSE programs and a limited number of graduates, researchers are just now beginning to have data that documents student, faculty, academic, employment, quality of life, and other program outcomes. The infancy of these outcomes may lead some to question whether the specific accommodations and supports provided to students with ID can be considered evidence based. The need for access to current information has led to the development of several resources for families, students, practitioners, and researchers to refer to for information on programs, research, and training. One of the most well-known sources within the field of PSE for ID is the Think College website (www.thinkcollege.net) which is based at the Institute for Community Inclusion at the University of Massachusetts Boston.

Current PSE for ID Research

The annual report from the Think College National Coordinating Center (2014-2015) states that a total of 324 students exited Transition and Postsecondary Programs for Students with Intellectual Disabilities (TPSID) in the 5th year of the program. Of those 324 students 47 exited with a degree or certificate and 129 were employed at a paying job within 90 days of exiting. The annual report does not specifically look at supports which lead to success for

students with ID in PSE. However, some data is presented regarding self-determination, person centered planning, student advising, and family involvement. These areas of focus fall into the category of supports and the data presented helps to narrow down which supports are necessary for students with ID to have access to while enrolled in a PSE program.

Model Programs

Currently, there are three model frameworks for service delivery within the PSE setting: (1) mixed/hybrid, (2) substantially separate, and (3) inclusive individual supports (Hart & Grigal, 2010; Hart, Grigal, Sax, Martinez, & Will, 2006; Hart et al., 2004; Plotner & Marshall, 2014; Theoharis, Ashby, & DeCloutte, 2009). One would think that having various models would allow students and families to choose which program to attend based on the level of services they feel are necessary and are most comfortable with. It should also allow students and families to participate in the college search process based on their wants and needs, much like their peers without disabilities. However, when comparing the number of programs and the number of models, it seems that there are fewer programs available that fall into the inclusive individual supports category. This could lessen student and families options when taking all factors (location, cost, model, etc.) into consideration.

The mixed or hybrid model consists of programs which are typically located on a community college or 4-year college or university campus. This model incorporates some separate classroom instruction, and also offers students with ID an opportunity to enroll in college classes, participate in campus social opportunities, and explore employment opportunities in the community (Neubert & Moon, 2006; Neubert, Moon, & Grigal, 2002). The mixed or hybrid model typically works best for students who are looking to continue gaining

independence, learning age appropriate social skills, life skills and skills specific to obtaining and retaining employment.

The separate model looks very much like it sounds, in that students are on a college or university campus and are provided employment training, job opportunities, and segregated classes based on a “life skills” curriculum for adults with ID (Neubert & Moon, 2006). The students with ID have limited to no access to university courses that their peers without disabilities have unlimited access to enroll in. Students who want to focus their continued learning on life skills and skills specific to obtaining and retaining employment may be more interested in a separate model.

The third model, inclusive individual supports, is the model of PSE in which students plan post-school goals with a team of people and then identify and locate the necessary services and funds for accomplishing the planned goal. Depending on the student’s preferences and interests, the student may attend college classes, a training (certificate) program, work in the community, and/or participate in recreational activities in the community (Hart, Zaft, & Zimbrich, 2001; Neubert & Moon, 2006). Students that attend a college or university which uses an inclusive model generally have a career or end result in mind and have the motivation and self- advocacy to succeed with minimal assistance or supports.

Another common practice that enables students with ID to access PSE is through the campus-based inclusion model (CBIM). With CBIM, students are still receiving special education services from their local public school. The students who attend a CBIM model receive funding for education under IDEA (2004) and receive supports and services under an Individualized Education Plan (IEP) (Grigal et al., 2013; Plotner & Marshall, 2014; Think College, 2013). The public schools and colleges or universities create a partnership in which the

students have access to college or university courses while finishing their final years (usually 2-3 years) of public education. Students are still exposed to their high school curriculum; however, the focus turns to college based activities (i.e. participation in college courses, internships, employment, improved self-determination, etc.) while receiving education amongst their same age peers.

It is important to note that programs are changing throughout their implementation and may start out with a description that falls into one model and realize that the needs of their students require another model. The availability of different model programs allows students with ID and their families to research and find a program that they believe best suits their needs.

Brief Literature Review

As discussed above, many of the laws and policies surrounding special education and transition (i.e. Individuals with Disabilities Education Improvement Act [IDEIA] 2004, state performance plans, Americans With Disabilities Act Amendments Act [ADAAA] 2008, and Association on Higher Education and Disability [AHEAD] 2012) have further encouraged educators, parents, and students to re-evaluate the importance of postsecondary education, specifically for those with ID (Shaw & Dukes, 2013). Due to the changes in these laws and policies, there has been a visible increase in the number of students with disabilities accessing and participating in postsecondary education, including those with ID (Grigal & Hart, 2010; Shaw, Madaus, et al., 2010). However, there is still a lack of the data that fully links access to success in postsecondary education and individual transition goals (Shaw & Dukes, 2013). It is imperative that researchers continue to identify evidence-based transition practices (Shaw & Dukes, 2013), especially in the area of postsecondary education supports for students with ID and those supports that lead to employment.

In an extensive literature review conducted by Neubert, Moon, Grigal, and Redd (2001) it was discussed that many PSE programs do not take advantage of an individual support (IS) model (Neubert et al., 2001). It is believed that the IS model would help support students with ID access PSE. In a follow up literature review by Thoma et al. (2011), it was found that the recommendations for future research made by Neubert, Moon, Grigal, and Redd (2001) were not heeded and therefore led to little research regarding the outcomes of students with ID in PSE. Also discussing the philosophy and theory of PSE for students with ID, Hart, Grigal, and Weir (2010) looked at the philosophical ideals that support PSE for students with ID. Three main conclusions were discussed, (a) when students are included in K-12 education, they can be included and successful in PSE as well (Jorgenson, McSheehan, & Sonnenmeier, 2009), (b) PSE can lead to an improved quality of life (Jorgenson, et al., 2009), and (c) PSE can lead to improved employment opportunities and higher wages for all students, including those with ID (Gilmore, Bose, & Hart, 2002; Grigal, 2009; Migliore, Butterworth, & Hart, 2009). These philosophical ideals should be taken into consideration when programs are being developed and implemented; especially when leaders are discussing what supports should be offered and embedded within their program.

Program leaders should take into account the current research on what supports have proven successful for students with ID during high school, as well as those supports that have proven successful for all students with any documented disability during PSE. Table 1 shows those that have been identified in the high school setting versus the PSE setting. It should be noted that the strategies listed for the high school setting are specific to students with ID, whereas those listed for PSE are specific to students with any type of documented disability.

Table 1.*Supports and strategies amongst high school and PSE settings*

Support/Strategy for Students with ID in High School	Documented Research	Support/Strategy for all Students with Disabilities in PSE	Documented Research
1. Self-prompted communication strategies	1. Hughes et al., 2000	1a. Self-advocacy & self-determination	1a. Seabag, 2010; Jameson, 2007; Gil, 2007; Garrison-Wade & Lehmann, 2009;
2. Problem solving	2. Agran, Blanchard, Wehmeyer, & Hughes, 2001	2a. Adult mentor/counselor	Webb et al., 2008
3. Goal setting and inclusion in goal setting	3. Copeland, Hughes, Agran, Wehmeyer, & Fowler, 2002;	3a. Accommodations	2a. VanBergeijk, Klin, & Volkmar, 2008; Morrison, Sansosti, & Hadley, 2009
4. Self-regulation of behavior	deBettencourt & Allen, 1999; Farlow, 1996; Trammel, Schloss, & Alper, 1994	4a. K-12 Inclusion	3a. Hadley, 2007; Webb et al., 2008
5. Self-monitoring	4. Agran et al., 2001	5a. Assistive Technology	4a. Neubert, Moon, & Grigal, 2002; Causton-Theoharis, Ashby, & DeCloutte, 2009; Zager & Alpern, 2010
6. Self-management	5. Hughes et al., 2002; deBettencourt & Allen, 1999; Farlow, 1996;		5a. Webb et al., 2008
7. Modification of classroom assignments	Trammel, Schloss, & Alper, 1994		
8. Assignment completion instruction	6. King-Sears & Cummings, 1996		
9. Inclusion in goal evaluation	7. – 9. deBettencourt & Allen, 1999; Farlow 1996;		
10. Universal design for learning	Trammel, Schloss, & Alper, 1994		
11. Access	10. – 15. Turnbull, Turnbull, & Wehmeyer (2007)		
12. Classroom ecology			
13. Educational and assistive technology			
14. Assessment and task modification			
15. Teacher, paraprofessional, or peer support			

The personal experiences of those students who have participated in PSE speak volumes in regards to the supports and strategies that promote success for students with ID in PSE.

Paiewonsky (2010) had nine students with ID document their personal experiences during two

semesters of PSE. From their participation, six themes were identified that helped to describe their experiences, some of which speak directly to supports and strategies: (1) having a new identity and feeling different, (2) access to different classes, (3) adjusting to new expectations, (4) working with educational coaches, (5) campus life, and (6) transportation. Another study, conducted by O'Brien et al. (2009) also looked at the experiences of students with ID in PSE. They found four themes that can be applied to both the academic and social supports: (1) journey of students, (2) student as a learner, (3) student as a friend, and (4) students with ID but not attached to an agency.

Rationale for Study

This study attempted to understand the experiences of young adults with ID who completed an inclusive postsecondary education program. Although there is research to support specific strategies and supports that lead to successful experiences in postsecondary education for students with disabilities, the majority of that research focuses on students with high incidence disabilities (i.e. learning disabilities, emotional disabilities, and other health impairments). The recent push from the field for postsecondary institutions to open their doors and create new programs for students with ID and autism (i.e. mild and moderate) has led to a need for researchers to investigate whether participation in postsecondary education results in improved employment outcomes for young adults with ID and whether inclusive opportunities are perceived to be associated with improved outcomes.

Statement of the Problem

With the number of PSE programs for students with ID continuing to increase, there has been very limited research to determine whether participation in PSE have resulted in improved

employment and adult outcomes and whether having inclusive PSE programs has a similar impact on improved post school employment outcomes.

Design

This study followed a qualitative phenomenological research design (Smith & Fowler, 2009) to understand the experience of young adults with ID who have completed a PSE program and their transition to adult life. Four young adults with ID, four PSE program staff members, and five parents/guardians of the young adults with ID participated in this study. The study was designed to understand those experiences that participants identify as having contributed to their post school outcomes.

Theoretical Framework

Phenomenological methods focus on understanding the experience through which the participant is going through or has gone through. Phenomenology is grounded in the philosophy of Edmund Husserl, Maurice Merleau-Ponty, Jean-Paul Sartre, as well as the social sciences and philosophy (Giorgi, 1985; Van Manen, 1990). There are four main concepts that make-up phenomenology; (1) nature of conscious experience, (2) intentionality of directed action, (3) person in context, and (4) situated human experience.

The nature of conscious experience is defined by Van Manen (1990), “to be conscious is to be aware, in some sense, of some aspect of the world” (p.9). The researcher must be aware of the numerous factors that can play a part in an individual’s interpretation of their experience (i.e. physical surroundings, emotional feelings, senses, psychological components, etc.). When a participant chooses to communicate their experience with the researcher, they choose specific portions of their experience because it is meaningful to them for one reason or another. The researcher must consider the parts of the experience that are not being communicated as well.

Husserl (1931) defines intentionality as one directing every human experience or action toward something in the world (Pollio, Henley, & Thompson, 1997). Within intentionality consists a neoma and a neosis. A neoma is what is presented to the experiencer or the “thing” (p. 166, Paul, Kleinhammer-Tramill, Fowler). A neosis is the perception of what is experienced. The researcher is then challenged with understanding what has actually been presented and what has been perceived.

The third concept, person in context, relies on the importance of “our encounters with objects, ideas, and people...what we are aware of in a situation reveals something important about who we are.” (Pollio, Henley, Thompson, 1997, p. 8) The researcher, when using the phenomenological approach, must attempt to understand the context of the situation through which the narrative is unfolding and how the context impacts the participant’s experience.

The situated human experience is the final principal of phenomenology, in which the researcher must understand and take into account that the situation is unique to each participant and each experience. Pollio, Henley, and Thompson (1997) describe, “the situatedness of human experience, however, requires us to emphasis not only that there is a situation but that situation is significant only in the unique way it is experienced by the person” (p. 15).

The phenomenological research approach was appropriate to guide this study because it helped show how students with ID experienced their postsecondary education programs. The researcher is able to express their stories from their points of view, and use their experiences to guide the field to show what areas of postsecondary education still need improvement in order for students to be successful in PSE and obtain and maintain employment.

Research Questions

Based on the findings from the existing literature, the researcher focused on the experiences of students with ID while attending an inclusive PSE program. These experiences helped the researcher to gain a better understanding of the impact of inclusive PSE on outcomes, including employment, for adults with ID. Specifically, this study focused on addressing the following research questions:

1. What are the life experiences of adults with ID after 1 – 6 years of completing an inclusive, individualized PSE program?
2. How do adults with ID perceive their experiences in PSE influenced their adult life experiences?

Chapter II **A Review of the Literature**

All Students with Disabilities

Upon graduation from high school, the natural progression for students and young adults is to obtain a job in the workforce, begin technical training, or enter postsecondary education. Research shows that students who choose to enter into postsecondary education and earn a bachelor's degree, have an average annual income that is 62% higher than those who earned a high school diploma alone (Baum & Ma, 2007). The Bureau of Labor Statistics states this as a difference of about \$500 a week (www.bls.gov, July 2017). Those students, who choose to enter into postsecondary education may often face many different challenges during this time of transition. However, for students with disabilities, those challenges are often more unique to their individual needs; with having to navigate through self-disclosure, meeting with the disability support services office, managing their accommodations, and learning how to handle the pressures of both academic and non-academic life (Getzel & Thoma, 2008).

Morningstar et al. (2010) note that self-advocacy, self-awareness, goal setting, involvement in the IEP process, and postsecondary skills preparation have all been shown to increase students success in postsecondary environments, including postsecondary education. These skills are also seen as important to students who are currently participating in postsecondary settings. In previous studies, students have responded that they believed if they had received direct instruction on these skills, they would have been better prepared for

postsecondary education and have been more successful in their college level courses (Jameson, 2007; Thoma & Getzel, 2005).

The purpose of this section is to present a critical review of the existing literature that focuses on the need for supports for students with ID to be successful in PSE. Specifically, the following topics are reviewed: (a) the philosophy and theoretical thinking that supports the need for and implementation of PSE for students with ID, (b) the literature that discusses successful supports for students with ID during the high school years, (c) the literature that focuses on successful supports for students with ID within the high school setting, that may be important for access to and support in the PSE setting, (d) the literature that discusses supports that help students obtain employment, (e) the personal experiences of students, professors, and researchers who have been involved in PSE for students with ID, and (g) future directions in research on the supports necessary for students with ID to succeed in PSE are suggested.

Methodology

An electronic search of articles that related to supports necessary for students with ID was conducted through major education data bases ERIC and Education Research Complete. Potential articles for review were found using the following descriptors from three categories: category 1: mental retardation (MR), intellectual disability, intellectual disability; category 2: postsecondary education, college; category 3: transition, supports, accommodations, and employment. Upon review of the abstracts and articles identified with those descriptors, the following were added: self-advocacy, inclusion, students, outcomes, and high school. In addition, a secondary search for articles and published papers was conducted through the ancestry approach, as well as examination of websites of programs described in published articles or national groups that promote PSE for students with disabilities. In addition to the

database and ancestry search, a hand search of the following journals from winter 2009 to spring 2013 was completed: *Career Development for Exceptional Individuals*, *Education and Training in Autism and Developmental Disabilities*, *Exceptional Children*, *Focus on Autism and Other Developmental Disabilities*, *Journal of Postsecondary Education and Disability*, *Teaching Exceptional Children*, and *The Journal of Special Education*.

Due to the infancy of postsecondary programs for students with ID and the limited research in the area of supports necessary for success in such programs, the electronic search for articles was expanded to include those pertaining to postsecondary supports for students across all disability categories (e.g., learning disabilities, attention deficit disorder) was conducted through ERIC via EBSCO. Potential articles for review were chosen based on the following descriptors: post-secondary education, self-determination, transition, learning disabilities, disability, supports, and college. Upon review of the abstracts and articles found with those descriptors, the following were added: self-advocacy, accommodations, adult mentor, peer mentor, inclusion, assistive technology, and parent role. Although not all disabilities or disability categories were represented, none of them were purposefully omitted. A search for literature reviews on transition to postsecondary education was also conducted. In addition to the database and reference list search, a hand search of the following journals from winter 2009 to spring 2013 was completed: *Career Development for Exceptional Individuals*, *Education and Training in Autism and Developmental Disabilities*, *Exceptional Children*, *Teaching Exceptional Children*, and *The Journal of Special Education*. A total of 14 articles were chosen for review within the subsection of college supports currently in place for all disabilities.

For the purposes of this literature review, PSE for students with ID was defined as, “a program that provided education or vocational training to individuals with mental retardation or

other severe disabilities within two- or four-year colleges or universities... as well as for those students who were 18 to 22 years old, enrolled in public schools, and receiving services or instruction within a post-secondary setting” (Neubert, Moon, Grigal, & Redd, 2001, p. 156). ID is used to describe a broad group of individuals who have extensive support needs including persons with mental retardation, traumatic brain injury, autism, and multiple disabilities (U.S. Department of Education, 2004; U.S. Equal Employment Opportunity Commission, 2004). It is also important to note that the plural form of ID (intellectual disability) is used in this literature review. The plural form includes persons with more pervasive support needs, and may be considered to have mental retardation, autism, traumatic brain injury, and/or multiple disabilities (U.S. Department of Education, 2004; U.S. Equal Employment Opportunity Commission, 2004). In the past, a person who has been identified as having mental retardation would be considered to have an ID (Schalock, Luckasson, & Shogren, 2007).

The initial electronic and ancestry search yielded over 600 articles, policy documents, and technical assistance papers. From the articles and documents that were found, five natural themes were clearly seen: (1) philosophy and theory of PSE for ID, (2) supports for students with ID in high school, (3) supports that lead to employment, (4) college supports currently in practice for all disabilities, and (5) personal experiences. In reviewing the initial 600 articles (specifically abstracts); the six sections were taken into consideration and whether those articles addressed any of those topics. If not, they were omitted from the review of the literature.

Articles were also omitted from the review of the literature if they, (a) focused only on students with significant (i.e. severe) ID, (b) discussed laws that are not directly related to the education and inclusion of students with ID in PSE, (c) informally described experiences of key players (students with ID, family, faculty, etc.) in PSE programs for students with ID, but did not

include their personal voices, (d) discussed aspects of PSE but did not give a complete overview or description of the PSE model currently in place, and (e) discussed supports, accommodations, and modifications for students without disabilities. Upon the completion of vetting of articles, a total of 37 articles were included in the literature review.

Five Emerging Themes

Philosophy and Theory of PSE for Students with ID.

“Every child wants to be believed in.”

(Claire, student with ID attended Edgewood College, Wisconsin; Bible, C., 2010)

One of the many reasons for creating access to PSE for students with ID arises from the amount of time that they spend in high school. Many students with ID who receive services through special education remain in high school until their 21st birthday; and in some states until their 26th (i.e., Michigan; Grigal & Hart, 2010). The length of time spent in high school and the noticeable difference in ages (academic goals, personal goals, social interactions, etc.) between the students with ID and their peers without disabilities often leads to frustration for the student as well as their family. Their peers without disabilities have moved on and are working towards accomplishing their postsecondary goals, and the students with ID are still being instructed on academic tasks often with little focus on postsecondary goals. In 1995, the Board of Directors of the Division on MR and Developmental Disabilities (DD) of the Council for Exceptional Children (CEC) released a position statement in regards to the educational practices for students with MR and DD (Smith & Puccini, 1995). They recommended students with disabilities that required educational supports past the age of 18 graduate with their same-age peers, and then continue their education until the age of 22 in the same age-appropriate settings such as college.

Another call for change arose from the inclusion movement that began with the passage of the Education of All Handicapped Children Act of 1975 (PL 94-142). However, the push for

students with developmental and ID to be included within the regular education classrooms and with their peers without disabilities throughout elementary, middle, and high school was not seen until the Reauthorization of IDEA 1997 (PL 105-17; Grigal & Hart, 2010). Students with ID and their families began to push the inclusion movement to the next level by expressing a want and/or need for inclusion and access to education and experiences in PSE as they had been receiving during their K-12 school years; along with the expectation that it would be age appropriate and aligned with the same experiences that their peers without disabilities were encountering (Grigal & Neubert, 2004).

Neubert, Moon, Grigal, and Redd (2001) conducted an extensive literature review on PSE programs and supports for students with MR and other significant disabilities. Their purpose for the literature review was to (a) identify the philosophical basis for PSE programs for students with ID, (b) identify practices, and (c) summarize the research on the effects of PSE for students with ID. The literature from 1970 – 1990 was examined, for a total of 27 articles reviewed. From those 27 articles, the authors found during the 1970's and 1980's that programs for students with ID on college campuses were in existence, however, they were still fundamentally separate programs. There was also very little information on how to replicate programs, best practices for including students, and necessary adaptations for success within the literature. During the 1990's, a philosophical shift was seen in providing students with disabilities access to postsecondary education during their last few years (ages 18-22) of high school, while they were still receiving special education supports and services from their public school system. This shift was most likely due to the awareness of the focus on transition planning mandated by IDEA 1990 and IDEA Amendments of 1997 (Neubert et al., 2001).

The authors also discuss a lack of literature that used the individual support (IS) model. The IS model is described as providing students inclusive, community-based services in age appropriate settings after they turn 18 (Page & Chadsey-Rusch, 1995). The supports that are provided through the IS model are based upon the individual interests and needs of the student, taking into account the students' natural environment and the ability to make and access appropriate accommodations (Ramler & Wood, 1999). The IS model would then help students to have greater access to the postsecondary environment, and not be limited in their options (i.e. courses, extra-curricular activities, jobs). There were no limitations stated regarding the literature review that was conducted. Several recommendations were made for future research to focus on student outcomes, supports and accommodations for students, personnel training, and the location of PSE programs.

A follow up to the literature review completed by Neubert, Moon, Grigal, and Redd (2001) was conducted by Thoma et al. (2011). This group of researchers wanted to see if there had been any changes in the types of programs offered, student outcomes reported, and outcomes regarding PSE over other transition options. So as not to repeat the previous literature review and to discuss recent changes and progress with PSE for ID, Thoma et al. (2011) reviewed the literature from 2001 to 2010 using similar definitions and keywords as used in the Neubert et al. (2001) literature review.

In comparison to the literature reviewed by Neubert et al. (2001), the 24 articles reviewed discussed a detailed description of PSE experiences for students with ID, as well as details regarding specific program features. The literature reveals a difference between the numerous programs, the features (i.e. program design, goals, guiding principles), supports, and admission requirements. Thoma et al. (2011) also discussed the progress seen in the literature regarding

programmatic details about how to implement new programs while facing judgment of college/university personnel, parents, students, the community, the special education field, and others. The researchers also found a difference in the literature from the previous 10 years to have a focus on trends specific to the field or an overview of a specific state or region, not just one specific program. National studies examined transition services and outcomes (Katsiyannis et al., 2005), as well as the views of parents (Grigal & Neubert, 2004), faculty (Fisher, 2008), and those involved in the development of PSE programs (Neubert & Moon, 2006; Weir, 2004). Thoma et al. (2011) found several articles that were presented from the student point of view and had a focus on their needs specifically (Casale-Giannola & Kammens, 2006; Hart et al., 2010; Neubert & Redd, 2008; Redd, 2004; Zafft, 2006; Zafft et al., 2004;). These articles discussed the challenges of implementing PSE programs for students with ID, as well as how important individualized supports and services are for students with ID.

When looking at outcomes of PSE programs for students with ID, Thoma et al. (2011) found that the recommendations of Neubert, Moon, Grigal, and Redd (2001) in the previous literature review were not followed by researchers, and there was still a limited amount of research regarding the outcomes of students with ID in PSE. However, the researchers found positive outcomes to be reported from students with ID in PSE programs regarding their experiences (Casale-Giannola, 2005; Dolyniuk et al., 2002; Hamill, 2003). The students reported an increase in what they learned academically, socially, and functionally when compared to what they learned in the high school setting.

The final area that Thoma et al. (2011) examined to see if changes had occurred over the past 10 years was the outcomes of PSE for ID versus other transition outcomes. The authors noted that their final question regarding outcomes amongst the various transition options was

unable to be completed. All of the research studies reviewed used different definitions of common terms (i.e. PSE, student with ID, support services), which led to challenges in the analysis of the final question. Limitations to the literature review were discussed. The authors believed the keywords used for article searches may not have been sufficient due to the design of many of the programs. They also felt that if programs which implement an alternate design (job coaches, community living, etc.) had been included a richer comparison could have been made. Lastly, the authors believed that the goals of the programs should have been used to help determine the quality of the type of program and educational experiences that are offered. Final recommendations to future researchers are to continue measuring outcomes and the development of a systematic method in which implementation of programs and models can be compared.

Hart, Grigal, & Weir (2010) discuss the philosophical ideals that support the arguments for PSE for students with ID. One argument is that PSE is seen as a natural progression from the inclusive K-12 education that students with ID have accessed. Research suggests that when students are included and successful in K-12 education, they can be successful in PSE environments as well; when held to high expectations and given the necessary supports (Jorgenson, McSheehan, & Sonnenmeier, 2009). Hart, Grigal, & Weir (2010) also discuss how PSE can lead to an improved quality of life. When persons with disabilities are given the opportunity to participate in the same activities (i.e. postsecondary education) as their peers without disabilities, they are more likely to have an improved quality of life and less likely to be seen as dispensable members of their community (Uditsky & Hughson, 2006; Wolfensberger, 2000). Hart, Grigal, & Weir (2010) also give some attention to the correlation between college attendance and positive employment outcomes. Researchers suggest that the same known fact of how a college education can lead to greater employment opportunities and higher wages, are also

applicable to students with ID who attend PSE (Gilmore, Bose, & Hart, 2002; Grigal, 2009; Migliore, Butterworth, & Hart, 2009). Due to this, the authors strongly suggest that PSE opportunities for students with ID include an employment component. Finally, the positive impact of the inclusion of students with ID on students, faculty, and the entire college community is discussed. Faculty members and students who have had students and peers with ID in their classes talk of how understanding and appreciative they became when interacting with the students and seeing the differences and similarities between themselves and the students with ID. The faculty members and students also talk about how they see the students with ID contributing to both the college community, and their own personal learning.

Limitations were not discussed due to the article being an overview of PSE options for students with ASD and ID. The authors give several recommendations for future research and improving access to PSE for students with ASD and ID. Some of those recommendations are: (1) including PSE options for students with ASD and ID in personnel preparation programs, (2) provide professional development for faculty regarding why students with ASD and ID should be included in PSE, (3) aligning policy and laws to reflect common definitions, (4) defining PSE programs within policy and laws and eliminate “separate” PSE programs, (5) continue educating families and providing resources on PSE for ASD and ID, (6) explore residential options, (7) help PSE programs build partnerships with employers, businesses, state and local agencies, (8) continue to develop monitoring and evaluation standards, and (9) provide full descriptions of program variables for college searches.

These descriptive overviews and extensive literature reviews have helped to lay the foundation for researchers to understand what research is being done and where future research needs to go. While the field of special education and higher education have partnered together to

open the doors for students with ID to access PSE, there is still little research to show that students with ID, as well as the communities in which they live, are benefiting from such programs in more ways than they would if they did not attend PSE. However, these philosophical and theoretical ideas surrounding PSE for students with ID have played a huge role in the systematic changes amongst federal, state, and local policies and mandates regarding access to education for individuals with disabilities, specifically those with ID.

Supports for Students with Intellectual Disability in High School.

“I want to go through the same door as all my friends.”

(Micah, student with ID at OPTIONS Program at Oakland University in Rochester, Michigan; Fialka, 2010).

The IDEA Amendments of 1997 state that students with disabilities should have access to the general education curriculum to the highest degree possible. It also states that appropriate modifications to the general education curriculum must be provided in order to ensure that students are successful and are having their educational needs met. As early as 1983, Feldman, Saletsky, Sullivan, and Theiss stated that, “one of the best supported findings in recent years demonstrates that the expectations that teachers hold about student performance are related to subsequent student outcomes” (p. 27). This is a powerful statement that can still be seen within the education system today. It also helps to support the need for students with ID needing to be included and active participants within in the general education setting.

Palmer, Wehmeyer, Gibson, and Agran (2004) note six specific strategies that have been documented as successful for students with ID in regards to curriculum augmentation: (1) self-prompted communication strategies (Hughes et al., 2000); (2) problem solving (Agran , Blanchard, Wehmeyer, & Hughes, 2001); (3) goal setting (Copeland, Hughes, Agran, Wehmeyer, & Fowler, 2002); (4) self-regulation of behavior (Agran et al., 2001); (5) self-

monitoring (Hughes et al., 2002); and (6) self-management (King-Sears & Cummings, 1996). Curriculum augmentation refers to enhancing the general education curriculum without altering it (Knowlton, 1998). Through curriculum augmentation students are able to enhance their general learning and self-regulation skills (Palmer et al., 2004). While the above strategies have been documented as successful strategies for students with ID, they still have not yet been fully explored as to their effect on student performance outside of the special education classroom (i.e. general education). These six strategies are important for all students, and are being implemented in the general education curriculum daily. When these strategies are implemented school wide, the opportunities for full inclusion are increased and pullout instruction for specific students are reduced (Palmer et al., 2004). Having these strategies implemented in the school as a whole, will not only help to prepare students for PSE, but it will also help faculty and staff better understand the need for inclusion and how students with ID can help contribute positively to society.

Copeland, Hughes, Agran, Wehmeyer, and Fowler (2002) discuss five strategies that they found in the literature (deBettencourt & Allen, 1999; Farlow 1996; Trammel, Schloss, & Alper, 1994) to support secondary students in obtaining the necessary skills to be successful in the general education classroom. Those five strategies are: (1) modification of classroom assignments, (2) assignment completion instruction, (3) self-monitoring instruction, (4) inclusion in goal setting, and (5) inclusion in goal evaluation. The purpose of their study was to combine the five strategies into an intervention package to see the effects that the combined strategies would have on improving the academic skills of students with ID. Four students with ID participated in the study. They were all enrolled in at least one general education course, stated that they had a desire to improve their academic performance, and were observed to have difficulties initiating conversation or completing written assignments (Copeland et al., 2002).

The researchers used a multiple-baseline-across-participants design to evaluate the effects of the intervention package on the participants' academic skills.

The intervention package proved to be successful in improving the worksheet completion skills of all participants involved. The increase in worksheet completion was also seen to positively affect the participants' grades, accuracy and independence in self-monitoring performance. This study illustrates that oftentimes when strategies are combined, they have greater outcomes for those involved. In comparing the participants' baseline data to the outcome data, one can see that modification of assignments alone did not improve the participants' performance (Copeland et al., 2002). Researchers noted and discussed some limitations with the study and outcomes. Those limitations were: (1) the changes observed are only a beginning step to improvement for students participating in the general education curriculum, (2) the type of worksheets that were used in the classroom did not reflect best practices, specifically for students with low reading skills, (3) participants had limited involvement in their goal setting, (4) the classroom teacher did not directly implement the intervention package.

The results of this study support the need for greater inclusion of students with ID into the general education setting, both in the K-12 and PSE environments. Although the study did not include a large number of participants, the results imply that when students are given and instructed on strategies that will help them within the general education setting, they will be successful. It is also noted that with the appropriate combination of instruction and various supports, students with ID can display the appropriate classroom skills and behaviors (Copeland et al., 2002; McDonnell, 1998).

Wehmeyer (2006) published an overview of the research and model development efforts regarding students with ID and access to the general education curriculum. Within that article,

Wehmeyer discussed six supplementary aids and services that were identified by Turnbull, Turnbull, and Wehmeyer (2007) as essential in helping to ensure access to the general education curriculum for students with ID. The six domains: (1) universal design for learning, (2) access, (3) classroom ecology, (4) educational and assistive technology, (5) assessment and task modification, and (6) teacher, paraprofessional, or peer support are described in Table 2.

Table 2.

Supplementary aids and services

Domain	Definition	Examples
Universal design for learning	Modifications to how curriculum is presented or represented or how students respond to the curriculum	Digital talking book formats, advance organizers, video or audio input or output
Access	Modifications to the community, campus, building, or classroom to ensure physical and cognitive access	Curb cuts, wide doors, clear aisles, nonprint signage
Classroom ecology	Modifications to and arrangements of features of the classroom environment that impact learning	Seating arrangement, types of seating, acoustics, lighting
Educational and assistive technology	Technology that reduces the impact of a person's impairment on his or her capacity	Calculator, computer, augmentative communication device
Assessment and task modifications	Modifications to time or task requirements (but not content or material) to assist in participation in assessment or educational task	Extended time, scribe, note taker, oral presentation

Table 2 (continued).

Teacher, paraprofessional, or peer Support	Support from another person to participate in instructional activities	Peer buddy, paraeducator, teacher
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Source: Developed by Turnbull, R., Turnbull, A., & Wehmeyer, M. L. (2007). *Exceptional lives: Special education in today's schools* (5th ed.). Columbus, OH: Merrill/Prentice Hall.
Permission will be obtained from the publisher if the manuscript is submitted for publication.

In the articles conclusion, Wehmeyer (2006) discusses two specific studies (Soupkup, Wehmeyer, Bashinski, & Bovaird, 2007; Wehmeyer, Lattin, Lapp-Rincker, & Agran, 2003) that looked at the progress of the field in regards to students with ID and having access to the general education curriculum. The first study was an observational study in which 33 participants with Mild ID were observed in the natural occurring classroom setting. Within that setting, researchers examined how much/how often students were engaged in tasks related to the general education curriculum. It was noted that students observed in the general education classroom displayed on-task work behaviors in 90% of observation intervals. However, those observed in a self-contained setting displayed on-task work behaviors in only 50% of observation intervals. In both settings (general education and self-contained), students were observed receiving accommodations 5% of the time, completing an adapted task 3% of the time, and being instructed on how to participate in the general education curriculum 0.15% of the time. Although students were included in the general education classroom, they were not truly accessing the curriculum (Wehmeyer, 2006). These findings support the need to implement and teach students with ID the appropriate strategies for accessing the general education curriculum. They cannot simply be placed in a classroom and be expected to perform to the best of their ability without having the proper supports in place.

In the second study, Soupkup et al. (2007) researched the degree to which students with ID have access to the general education curriculum, the different variables of the classroom that

correlate to access to the general education curriculum, and any instructional, physical, and setting conditions that lead to student success. The sample of students was made up of 19 elementary aged students (7 to 12 years) with ID or autism. Students were observed for three 20-minute intervals during their general education social studies or science class. The complete findings are not discussed in this literature review due to the age difference between elementary aged students and college bound students. However, it is important to note several of the comments made by the authors regarding the implications for practice. Soupkup et al. (2007) found the use of paraprofessional support to be the most used accommodation within the general education setting, but only about half of the time during instruction. Peer support was also noted as one of the more commonly used accommodations for students with ID in the elementary setting. There is also some brief discussion within this study regarding the lack of curriculum adaptations being used and the complete absence of curriculum augmentations. The authors note that more accommodations should be used within the general education setting in order to support students with ID, specifically various assistive technologies. Limitations were noted within the study to be: (1) the small sample size, (2) the teacher being the same during several observations. This makes it harder to differentiate between the effects being from the classroom setting or the teacher, (3) the access score equation was based on the researchers' opinion and a previously developed framework. It was not validated by external researchers, (4) there was no guarantee that the lessons observed were part of the students typical activities, (5) variability was lost due to categorical variable being created out of a continuous variable, and (6) the findings were correlational and cannot be determined as causal.

Lee et al. (2006) examined curriculum adaptations and augmentation strategies that help students with ID access and illustrate progress within the general education settings. While no

intervention was done in this particular study, the authors examined research and strategies known to improve the academic skills of students with disabilities in general, not necessarily ID. Specific recommendations for how to implement and modify strategies are given. A variety of learning strategies (shadowing, verbatim notes, graphic organizers, semantic maps, mnemonics, chunking, questioning, and visualizing strategies) (Lee et al., 2006) are discussed throughout the manuscript. The authors note that these curriculum adaptations and augmentations have been proven successful for students with learning disabilities and may benefit students with ID as well if adapted and instructed appropriately (Rosenthal-Malek & Bloom, 1998). Due to the lack of research on these specific learning strategies for students with ID, the authors urge the field to continue to look more closely at how these curriculum adaptations and augmentations can help students with ID not only access the general education curriculum, but also receive the necessary instruction from the teacher with specific adaptations of presentation and representation of material.

Lee et al. (2006) also examine and discuss the importance of student-directed learning strategies (i.e. antecedent cue regulation, self-instruction, self-monitoring, self-evaluation, and self-reinforcement) and self-determination for students with ID in accessing and performing in the general education curriculum. The authors point out that there has been much research regarding these two strategies (Agran et al., 2003; Algozzine, Browder, Karvonen, Test, & Wood, 2001; Palmer et al., 2004; Wehmeyer, Avery, Mithaug, & Stancliffe, 2003; Wehmeyer et al., 2004; Wehmeyer et al., 2001) and how they to lead to positive outcomes for students with ID, as well as increased access to the general education curriculum. Due to nature of the manuscript, limitations are not discussed. However, recommendations to the field for implications and future research are made. It is suggested that the field continue examining how

strategies can be implemented to further students with ID inclusion in the general education curriculum. Curriculum augmentation is also discussed as an area of importance for the field to continue examining and how it enables students with ID to be the primary agent in their own success.

It seems that the field is looking at the supports necessary for students with ID to be successful and access the general education curriculum. Unfortunately, the research that has been conducted regarding these supports still display a number of negative factors: (1) supports are being implemented without the proper instruction being given to the student or necessary personnel, (2) supports are being implemented individually, not in a combination or package format, and (3) supports are being implemented, but the curriculum is not being modified or augmented. It seems that the research field is aware of strategies and supports that can help students access the general education curriculum, however, the information is not being disseminated or explained properly to those who are doing the daily instruction and working with the students with ID.

While research continues in regards to the supports that are necessary for students with ID to be successful in the PSE environment, it is important that we look at the supports that have proven to be successful for students across all disability categories in the PSE environment. Researchers may be able to use the supports that have proven successful for students across all disability categories as a bridge to how they may help in serving students with ID in the PSE environment.

Supports that Lead to Employment.

Participation in PSE has been long documented to lead to higher annual earnings (Baum & Ma, 2007), increased employment (Neubert, Moon, Grigal, & Redd, 2001), access to health

insurance (Baum & Ma, 2007; Bureau of Labor Statistics, 2010; Mischel, Bernstein & Allegretto, 2007; Thoma et al., 2011), student/adult independence, an overall improved quality of life, and increased personal and professional relationships (National Center for Educational Statistics, 2006). Recent outcomes for students with ID that attend PSE are increased vocational experiences and more opportunities for competitive employment which ultimately leads to increased wages, personal and financial independence, and self-determination (Migliore, Butterworth, & Hart, 2009; Petcu, Chezan, & Van Horn, 2015; Ross, Marcell, Williams, & Carlson, 2014; Smith, Grigal, & Sulewski, 2013; Wehman & Scott, 2013).

Peer Mentor/Relationship.

Research has shown that persons with ID are likely to obtain and maintain successful employment when meaningful workplace relationships are formed and maintained (Butterworth, Hagner, Helm & Whelley, 2000; Chadsey & Shelden, 1998; Hagner & DiLeo, 1993; Szymanski & Parker, 1996). Eisenman, Farley-Ripple, Culnane, & Freedman (2013) researched the use of social networking during PSE and how it impacted students with ID during their programs. Although employment outcomes and social networking were not specifically examined, it was discussed by the researchers when looking at how some of the peer groups of students with ID had shifted over time from family members and caregivers to their peers. This was viewed as a positive effect of social networking and natural peer mentoring and/or positive relationships. The researchers recommended that PSE program staff should continue to look at social networking and how it can help to improve program outcomes, specifically those related to employment (Eisenman et al., 2013, p. 379).

Whelley, Radtke, Burgstahler, & Christ (2003) discussed the importance of peer mentoring and relationships for students with ID as they transition to PSE. Peer relationships are

defined by the researchers as, “people of similar age, level of power and experience, resulting in opportunities to create symbiotic two-way relationships” (p. 46). Too often students with ID are forced into relationships that are one-way, structured, and the person without a disability is given a supervisory role or position. The peer relationship allows the student with ID to have the same social and emotional relationship, within both the educational and work environment, as their peers without disabilities.

Work Experiences/Internships, Vocational Assessments, and Career Counseling.

Many of the postsecondary education programs for students with ID state that one of their outcome goals is employment (Petcu, Chezan, & Van Horn, 2015). It is imperative that postsecondary education programs incorporate work experiences/internships, vocational assessments, and career counseling as part of the student’s education experiences so that they are prepared to enter into competitive employment upon program completion.

Petchu et al., 2015 conducted a national survey to determine what “vocational-related supports” postsecondary programs are offering to their students with intellectual disabilities (p. 359). Surveys were sent to 206 directors and coordinators of PSE programs found on the Think College website. The researchers found that majority of the PSE programs were providing “career-vocational assessments, career counseling, and person centered planning” (p. 367). However, the researchers found that few students were receiving paid employment experiences on or off campus (p. 367). It was also revealed that many PSE programs for students with ID are using natural supports in the workplace or on internship sites vs. transition specialists or job coaches. While natural supports are amazing resources and should be utilized, they would be a final support once the student has reached a specific level of independence. Assistive technology was also found to be a support that was not being provided or utilized in the workplace (p. 367).

Unfortunately, there seems to still be unsureness from employers regarding the cost and efficiency of assistive technology in the workplace. Petcu et al. (2015) suggest PSE staff as well as students with ID help to advocate for and help to educate employers on why assistive technology is needed and how helpful it is for the employee. Another significant finding was that many of the PSE programs incorporate self-advocacy skills and instruction into their PSE experience. Allowing students to have natural experiences in which they can practice the self-advocacy skills learned increases their success for handling transitions in the future, especially when they are no longer enrolled in a program where supports are in place (p. 368).

The researchers also found across programs that instruction regarding work incentives and disability benefits varied depending on the location of the university (i.e. urban or suburban) (p. 368). Another concern that arose from the research conducted was regarding the involvement of VR services “(e.g., assistance with life skills, career assessment, career counseling, job coaching, or job placement post-graduation)” (p.368) while students are enrolled in PSE. Petcu et al. (2015) found that there was no consistency across states regarding the number of students who are enrolled in a PSE for ID program and receive VR services. This was a concern for the researchers because many of the services that VR provides for students align with the education goals that are found in PSE programs for students with ID. Ideally, VR should be working with PSE programs, as well as other agencies, to help support students while they continue to further their education and career goals (p. 368).

Person Centered Planning.

Person centered planning (PCP) is a self-advocacy strategy that is often used with persons with disabilities to help create and develop plans for various stages of life. The plans are usually created with a team of trusted people who know the person that the plan is for or about.

The plan is also focuses on the persons end goal and strengths as well as how to ensure maximum community participation (Mazzotti, Kelley, & Coco, 2015; Weir, 2004).

Mazzotti et al. (2015) conducted a multiple-probe across participants study in which they looked at students with ID enrolled in a PSE program and their ability to use a Summary of Performance (SOP) to advocate for accommodations and supports during a PCP meeting and in postsecondary employment settings (p. 243). Students were taught how to use the Self-Directed Summary of Performance (SD-SOP) as well as how to participate in their PCP meetings. The researchers found that students responded well to the SD-SOP and were taking control of their PCP meetings after the intervention had been implemented. Students were now leading their own meetings and were able to advocate for their own needs. The researchers felt that this was a strategy that could and should be taught and used in PSE for students with ID as they prepare to complete their programs and obtain employment. Once they are hired, they will need to request accommodations and supports, and doing so through a SD-SOP and PCP meeting where they have already practiced the process would make the generalization to a new setting somewhat easier.

Weir (2004) discussed PCP and collaborative supports as successful strategies for students with ID in PSE as results from her qualitative participant observation study. It was noted that PCP in not a common practice in K-12 environments or in all PSE programs for students with ID (p. 118). The researcher felt that PCP is a “critical” factor in providing appropriate supports for students with ID in PSE (p. 118).

Supports for Students across All Disabilities in College.

Self-advocacy and Self-determination.

Upon looking at the literature of supports and accommodations for students across all disability categories in the PSE environment, self-advocacy and self-determination were two themes that occurred continuously. Self-advocacy is known as a student's ability to understand and explain his/her disability and how it impacts specific aspects of his/her life. Sebag (2010) states that self-advocacy helps students in "advancing [their] academic[s], transition, and communication goals, and in promoting their knowledge of self, strengths, and needs" (p. 24).

The need for students to self-advocate in the post-secondary education setting is a necessity due to the change in the laws that govern the services they receive. Within the K-12 setting, students often have case managers, a parent or family member, or other adult who advocates for them and ensures that they are receiving the accommodations and services necessary to be successful. When students enter PSE, they do not always have access to a case manager or an adult to advocate for them. They have to obtain and present documentation to show why they need specific services and usually have to justify the need of those services to individual professors or faculty around campus. These tasks can be challenging for any student in a new environment, especially a student with a disability who has not been taught what self-advocacy is, what it looks like, or how one possesses it. Table 3, developed by Gil (2007), illustrates the differences that students can expect in regards to how services are provided in the high school setting versus the PSE setting.

Table 3.

Differences in Student Responsibilities

High School	College
<ul style="list-style-type: none">• School district is responsible for identification and evaluation of disability• Public schools make modifications which may alter a program or curriculum if determined necessary for success• IEP or 504 Plans are required and prepared by the school with input from parents, teachers, and the students• Parents or guardians are the primary Advocates for a student's needs• Public schools must provide personal services when deemed necessary for success by the IEP team, including transportation, personal attendants, and assistive technology	<ul style="list-style-type: none">• Student must self-identify and provide documentation of disability at his or her own cost• Postsecondary institutions provide accommodations which do not alter the essential program or course requirements• Upon student's request, disability service provider prepares letters notifying professors of approved accommodations• Student must be his or her own advocate for academic needs• Postsecondary institutions are not responsible for providing any services that are not available to all students, including personal services and devices

Source: Developed by Gil, L. A. (2007). Bridging the transition gap from high school to college. *Teaching Exceptional Children*, 40(2), 12-15.

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Self-determination is important in the PSE setting because it is important for a student to know how their disability affects them and makes up who they are. Students need to know what their disability is, how it strengthens them, how it limits them, how they can “even their playing field” in comparison to those without disabilities, and how to explain to others the accommodations that they may need and why.

Jameson (2007) conducted an integrated study with qualitative and quantitative phases on the “relationship between success outcomes of...students with disabilities and self-determination” (p. 26). The quantitative phase focused on whether the positive outcomes of post-secondary education were related to higher levels of self-determination. The researcher examined the results of 48 surveys sent to students in the first year of their post-secondary program. The

surveys revealed 33 students disclosed to the university that they had a disability, with learning disability being the most common disability amongst the 48 students (p. 32). The overall results of the quantitative section showed that students with “more positive post-secondary outcomes” did in fact “possess higher degrees of self-determination” (p. 33). During the qualitative phase, Jameson looked at how students actually disclosed their disability and if self-determination played any role in that self-disclosure. The researcher found that students who chose to self-disclose generally did so because they possessed a high level of self-determination.

In another study, Gil (2007) looked at several factors that lead to student success during the transition to post-secondary education. One of those factors is self-determination. She states that self-determination is a skill that can be taught and should be taught prior to entering PSE. She suggests having students not only be involved in their IEP meetings, but also inviting support persons from the university or college that they are planning to attend.

Garrison-Wade and Lehmann (2009) found self-determination to be a reoccurring theme in the literature review they conducted about students with disabilities transition to community college. They summarized that students should possess the skills found in the self-determination model; with a main focus on self-advocacy and self-awareness (p. 431). Students should hold the skills necessary to request the appropriate accommodations and their personal needs. They also stated that a student’s level of self-determination can be influenced by those around him/her. The researchers found that many students had been told they were not “college material” and were not challenged academically like many of their peers without disabilities (p.431).

Another literature review by Webb et al. (2008) found self-determination to be a reoccurring theme in the existing research. It seems that the literature turns to self-determination

as a factor in successful PSE as well as success in adulthood, although research lacks showing evidence-based strategies and how to promote and implement such strategies (p. 195).

Adult Mentor/Counselor.

While all universities and colleges are required to have a disability support services center, they are not required to have an assigned adult to oversee the specific accommodations being provided to those students that need them. This role of accountability falls upon the student and is oftentimes overlooked if the student does not possess an appropriate level of self-determination or self-advocacy skills.

VanBergeijk, Klin, and Volkmar (2008) specifically investigated the transition supports for students with Autism. One of their recommendations was the use of an adult mentor or guide to help ensure students are receiving the appropriate educational and social supports needed to be successful. The researchers recommended “directive, explicit guidance and counseling” (p. 1364) for students with autism specifically. This level of support is not always necessary for all students with disabilities, however, the role of an adult to help guide them throughout their PSE experience is seen as a theme throughout the literature.

Morrison, Sansosti, and Hadley (2009) also examined students with Autism, specifically Asperger’s Syndrome, and how their parents perceived the needs of their children to be successful in a PSE setting. The researchers conducted a qualitative study with the use of four parent focus groups. The two main questions they used to develop their research were (1) what types of supports or accommodations that parents felt their children needed to successfully meet the expectations of post-secondary education and (2) what self-advocacy skills did the parents feel the students needed to possess in order to obtain the necessary supports and accommodations (p. 81). In regards to students having an adult mentor or counselor on campus that they could

turn to for help, the parents felt this was important to help ensure student success. The parents recommended that there be a specific adult within the student services program that they could regularly schedule meetings with to discuss the use and obtainment of accommodations, struggles with social skills, and other aspects of college life (p. 82-83).

Accommodations.

One might consider an adult mentor or counselor as a specific type of accommodation, which helps to level the playing field of a student with a disability when compared to a student without a disability. However, when most think of accommodations, they initially think of ways in which the test or testing environment can be modified. Most do not look at how the educational setting itself can be modified to meet the needs of all learners, including those with disabilities. Accommodations are defined as “changes to the delivery of instruction, method of student performance, or method of assessment that do not significantly change the content or conceptual difficulty level of the curriculum” (Hallahan & Hallahan, 2005, p. 491).

Hadley (2007) discussed the need for accommodations for students with learning disabilities in their first year of college. She conducted a qualitative study in which ten students participated in a focus group after their first semester of classes. The focus group discussed three main topics, with one being the different types of services the students felt were necessary in order to live up to the academic requirements of the university. The students found that accommodations were most necessary for writing assignments, extra time for tests, and note-taking assistance (p. 11). The students reported being dissatisfied with the accommodations available at the university level and the amount of time that they had to spend requesting them (p. 11).

The findings of Hadley's research are consistent with Webb et al.'s (2008) literature review, in which they found accommodations to be a necessity as well. Their research showed that students needed to be aware of the different accommodations available, the amount of time they needed to truly understand how to use an accommodation, and how to request and monitor the effectiveness of using accommodations (p. 200).

K-12 Inclusion.

Another central theme identified in the literature reviewed is the need for inclusion of students with disabilities in both academic courses and extra-curricular activities during the K-12 education years. Neubert, Moon, and Grigal (2002) discuss the work from a grant project by the U.S. Office of Special Education Programs (OSEP) about transition practices for students with significant disabilities (SD). In their discussion, they pointed out the need for "age-appropriate experiences for students with SD during their final years of public school" (p. 2). The inclusive setting during those final years of public school can serve as an assessment of what specific supports students need in order to be successful in an inclusive post-secondary education setting.

Causton-Theoharis, Ashby, and DeCloutte (2009) also discussed the need for inclusion during the K-12 education years. The researchers conducted a qualitative study in which they looked at two postsecondary programs on the same college campus designed specifically for students with significant disabilities. They addressed two central questions (1) the benefits and accomplishments of these programs and (2) what barriers occur during the implementation of these programs. One of their main findings was that the inclusive setting was seen as both a barrier and a benefit. The barrier to the inclusive setting was that some, if not, most students had not been exposed to a truly inclusive setting prior to entering the PSE program. Several of the "stakeholders posed the questions: "If we can demonstrate students' success here in an inclusive

setting, why are these students receiving segregated K-12 education? This puts a lot of pressure on educators during those younger years to step up to the plate” (p. 103).

Zager and Alpern (2010) observed the Campus-Based Inclusion Model (CBIM) which usually involves a public school program and a local college teaming up to provide services to students with disabilities as a team (p. 153). The students are included in courses and learning the same content as or with their same aged peers. They also participate in extra-curricular activities and hold work-study jobs. This kind of model is a great way to continue the inclusion efforts from the K-12 setting into the post-secondary setting.

Assistive Technology.

The final reoccurring theme that was identified in the literature was the need of students with disabilities to have access to assistive technology. Martinez-Marrero and Estrada-Hernandez (2008) refer to the definition of assistive technology “defined by the Technology-Related Assistance for Individuals With Disabilities Act of 1988, as any item, piece of equipment, or product system, whether acquired commercially off the shelf, modified or customized, that increases, maintains, or improves functional capabilities of individuals with disabilities” (p.56). Accommodations were described as tools that help level the playing field for students with disabilities when compared to their non-disabled peers. Assistive technology is considered a type of accommodation. For many students with disabilities, technology is needed to assist them in reaching both personal and academic goals.

Webb et al. (2008) found that students with disabilities who enrolled in PSE programs express a great need for assistive technology (p. 200). However, there seemed to be a challenge in ensuring that the assistive technology is a “right fit” for the student, but also that the student

knows how to use it. Appropriate technology and proper use of that technology may be the “difference between success and failure whether in a college course or career” (p. 201).

In examining the supports for students across all disabilities within PSE, it is clear that research has helped to narrow down the supports that have proven successful. However, the field needs to take the next step to further investigate why these supports work so well for students across disability categories and how they can be generalized to students with ID. It is also important for the field to look at whether these successful supports are part of the college/university environment, if they are solely driven by the students and their self-advocacy skills, or if it is a combination of both. The information gathered from those next-steps then need to be applied to PSE programs for students with ID, and evaluated to see the effect that they have on the various forms (academic, social, independent living, etc.) of success for students with ID.

Personal Experiences

“It was my first time going to college. When you start new things, you’re not sure you can do it. Then you just say in your head, ‘I think I can’ and then you just do it.”

(Adrian, student with ID at the University of Massachusetts Boston; Paiewonsky, 2010).

Thoma (2013) completed a phenomenological research study that looked at nine PSE programs for students with ID. Specifically, Thoma investigated the “range of supports and services provided as well as the program development process” (p. 285). The interview data collected was from the PSE program staff from across the Eastern, Southern, and Midwestern states, as well as across the range of PSE program models. The results of her research were divided into two major categories: *Mission/Philosophy/Priorities* and *Complex Layers*. Within the two categories, other minor themes were discussed.

Under the *Mission/Philosophy/Priorities* category, Thoma (2013) found six common themes: 1) self-determination, 2) UDL, 3) program completion/graduation, 4) assessments for student progress, 5) parent involvement, and 6) inclusion. *Self-determination* was described as a goal of many of the PSE programs; however, it was not the main goal of all programs. The program directors described self-determination skills being implemented throughout the program by the students having the power to make choices about the activities and classes they participated in, students establishing and analyzing their own goals, and students combining their goals with their program outline, coursework, and job opportunities (p. 291). *Universal Design for Learning* was also described as a main component of most of the programs. Students were exposed to many different methods and modes of instruction, assessments, and experiences throughout their time in their PSE programs.

Another common theme amongst the program directors was regarding *program completion/graduation*. One stipulation of the Transition and Postsecondary Programs for Students with Intellectual Disability competition from the Office of Postsecondary Education in the U.S. Department of Education (2010) funding was that each program have a “meaningful credential” upon program completion, but the credential was left to the discretion of the specific program itself (p. 293). Thoma found amongst the PSE programs, all of the directors voiced concern about ensuring that students had met both program goals and their own individual goals. However, the students often are not required to earn a specific number of credits or end of program assessment, their completion is often a “more holistic” (p.293) approach in which students accomplish their personal goals and secure employment prior to completing the program. The fourth theme, *assessments for student progress*, aligns with the first three themes discussed. Program directors commented about the need for assessments that PSE programs

could use to measure student individual goals, as well as goals within the PSE program itself and how it has met the needs of the students (p. 294).

Another theme that came to light was regarding *parent involvement*. Across the PSE programs there was an agreement that parents should still be involved with their son or daughter's educational experience, however, the program directors felt that the level of involvement from parents should align with the PSE program goals. For example, one program director discussed how they hold monthly meetings for parents, whereas another director discussed how it is made very clear upon admittance to the PSE program that self-determination is the focus and that parents will no longer be the first line of contact, the student will. The final theme that came to light in the *Mission/Philosophy/Priorities* category is that of *inclusion*. The program directors discussed how students were naturally being included across the campus, even when full inclusion wasn't the number one priority of the program.

The second category, *Complex Layers*, emerged from the qualitative coding with three additional themes being discussed: 1) *university administration/systems*, 2) *working with school districts and/or other community partners*, and 3) *continual program improvements*. Thoma (2013) discussed how all of the program directors expressed frustration and difficulty with understanding and navigating the *university administration/systems*. Some of the frustrations expressed were with having proper approval for students with ID to be included in academic classes. Some programs were limited in allowing students to attend academic classes of their choice because of tuition stipulations. Another frustration expressed was with program literature that was disseminated and/or available to all was still presenting a separate program for students with ID in that they were advertising different standards, requirements, and/or services that not all university students may have access to (p. 295). The admission process was another area in

which program directors expressed some frustration. There was not much consistency across universities in regards to how students were admitted. Thoma (2013) explains that some students are admitted as belonging to a specific program, some are admitted into a certificate program, and others are admitted with a “special” status (p. 295). However, even with the frustrations expressed, program directors discussed how once they had navigated through all of the administration/systems; program staff had an easier time assisting students with ID in accessing the same supports and services as were available to all university students.

While program directors discussed the struggle of navigating the administration/systems, they also discussed some frustration with *working with school districts and/or other community partners*. Dual enrollment programs must meet the requirements of K-12 education while exposing and allowing students to experience PSE to the fullest degree possible. One area that was a challenge for many programs was regarding student’s accommodations and modifications that were needed in order to access their education and/or environment. At the university level, students are able to request and use accommodations and modifications as long as it does not “conflict with the general expectations for a specific class or program” (p. 297); whereas, in the K-12 environment, students are “entitled” (p. 297) to receive necessary accommodations and modifications. Program directors discussed some frustration with having to make these two policies work together, but were willing to do so in order to provide the best experience for all students.

Another concern voiced by program directors came from the TPSID requirement of providing a residential component. The residential component is important for the PSE programs in that they provide real life opportunities for students to learn independent living skills, functional life skills, and other life lessons often necessary for students while working to

accomplish their goals (Thoma, 2013). Amongst the program directors, there was a consensus that the residential component was “difficult to implement” (p. 298) due to university policies and procedures. Some universities, as well as program directors, felt that waiting to add the residential component until after the PSE program had been implemented for more than a year may be a good idea and allow for most of the kinks of a new program to be worked out.

The third and final theme in the *Complex Layers* category was in regards to *continued program improvements*. All program directors, no matter how many years their program had been in implementation, expressed a continuous want and need to make improvements upon what was already in place.

Although limitations (i.e. complete inclusive program representation and not all programs being observed) were present in this study, there were still several implications that can be applied to future policy, practice, and research. Specifically, Thoma (2013) discusses the need for more longitudinal studies regarding the experiences of students with ID in PSE, what aspects of PSE programs help to improve student outcomes, and the background, qualifications, and experience that program staff needs to have in order to implement a successful program (p. 300).

Paiewonsky (2011) conducted a participatory action research (PAR) study in which nine students with ID documented and assessed their personal college experiences with digital media tools (i.e. digital cameras, pocket video cameras, digital story telling through VoiceThread). The students completed the PAR study over the course of two semesters. The results of her research were broken down into six themes that described their college experiences: (1) having a new identity and feeling different, (2) access to different classes, (3) adjusting to new expectations, (4) working with educational coaches, (5) campus life, and (6) transportation.

The theme regarding *having a new identity and feeling different* addressed the student's newfound feelings of independence and freedom while at college. They expressed feeling more "mature" due to the freedom that they had. In *having access to different classes*, the student's discussed the many different options that they had in courses at college as opposed to high school. The students also reported that the college courses often helped them to recognize their strengths and weaknesses. The students recommend "giving students opportunities to talk to other students about classes before enrolling in them and obtaining access to more classes related to their career interests" (p.37).

The students agreed that the college expectations were higher than those of high school and that they needed to be prepared for the new responsibilities in the *adjusting to new expectations* theme. They recommended that upcoming college students know college terms like, "syllabus, reading assignments, [and] due dates" (p.37). All of the students reported that *working with educational coaches* was helpful. They liked having someone to help them navigate the campus, explain how to read a syllabus, and show them how to organize their homework. Some of the students expressed frustration with their coaches offering too much help at times. In regards to *campus life*, students expressed that they enjoyed having the freedom to do activities that they enjoyed (surfing the internet, using the recreating center, eating in the cafeteria, etc.) In the final theme, *Transportation*, the students found having access to and knowing how to use public transportation was an important part of their college experience.

Paiewonsky (2011) described the students' feelings regarding their being part of a college campus. The students were given a voice and able to "collaborate on research rather than be the recipients of it" (p.41). Several limitations were noted and discussed: (1) small sample size, (2) representation of only one PSE program, therefore generalizations cannot be made across

programs, (3) a large amount of funding and time were required to complete the PAR, which could be seen as a limitation for future replication. However, research of this kind can be helpful in shaping, redesigning, and creating new programs for students with ID on college and university campuses.

An international study on the experiences of students with ID who attended Trinity College Dublin, Ireland was conducted by O'Brien et al. (2009). A qualitative research design was used to examine inclusion for students with ID and their personal feelings on their experiences. 19 students ranging in ages from 14 – 48 year old participated in focus groups, curriculum portfolios, Photovoice (pictures documenting daily events), and student PATH (Planning Alternate Tomorrows with Hope; a tool for transition planning) outcomes. Four central themes emerged from the students experiences: (1) journey of students, (2) student as a learner, (3) student as a friend, and (4) students with ID but not attached to an agency.

Within the *journey of students* theme, the students stated that the certificate course “made [them] grow up and mature and open more doors” (p.288). The students discussed various aspects in regards to the *student as a learner* theme. Overall, they expressed that they enjoyed learning new things, being like other learners/students, having access to tutors, obtaining more confidence, independence, and motivation, learning how to better communicate with others, and being able to work in a large group with other students (unlike their special classes in high school). The development of new friendships with their peers with and without disabilities was reflected in the last two themes: *student as a friend* and *students with ID but not attached to an agency*. The students were found to make new friends, some of which became known as best friends near the end of the semester. They would spend time with both their peers with and without disabilities. Activities such as dining out and hanging out at each other's houses were

mentioned as experiences that the students enjoyed doing with their new friends. Students various work experiences were also mentioned as being important to the students with ID, although it did not come out as a main theme. O'Brien et al. (2009) state that the certificate course at Trinity College Dublin has been a positive experience for the students with ID as well as for the entire campus. Limitations were not mentioned or discussed within this article.

Carroll, Petroff, and Blumberg (2009) conducted a qualitative study in which 12 pre-service teachers participated in interviews regarding their experiences in working with students with ID in the Great Conversations course (inclusive postsecondary class). The pre-service teachers were comprised of 3 graduate special education majors, 5 undergraduate secondary education majors, and 4 undergraduate special education majors. From the 14 interviews, several themes emerged. The themes were discussed and organized in the format of the authors research questions.

All of the pre-service teachers had positive remarks to share regarding the *value they saw in their involvement in the Great Conversations course*. They felt that it was a positive experience and added to their personal studies within the field of education. When asked *what value the pre-service teachers saw in having the students with ID participate in the Great Conversations course*, they unanimously agreed that students with ID should have “exposure...to the topics that were covered in the course” (p.360). They also felt that the course was important in helping the students with ID gain better social skills and build relationships with their peers. The pre-service teachers varied on their opinions and experiences in regards to *effective inclusive practices*. They were in agreement that hands-on activities were the most useful and that lecturing was the least effective strategy. Some pre-service teachers felt PowerPoint presentations and video instruction were helpful, whereas some did not agree. Group-work was

another area that the pre-service teachers believed was a positive teaching strategy. However, some noted that participation in the groups was “uneven” at times and would lead to “flat” discussions (p. 361).

When asked about *the use of inclusion in their future careers*, none of the students were adamant about inclusion being used at their future schools. Statements like, “school contexts [are] complicated and...inclusion might not work for all people,” (p.361) were made. Finally, when the pre-service teachers discussed their *attitudes about individuals with ID*, they felt that through participating in the Great Conversations course led to their feeling more comfortable with disabilities and feeling less anxious about working with individuals with disabilities in the future. Limitations were not mentioned or discussed within this article.

These personal experiences help to illustrate the positive outcomes that have come from the inclusion movement within higher education. Not only are the students with ID benefiting from PSE, but those persons they come in contact with are seen to benefit as well. Unfortunately, there are still persons and organizations that believe students with ID do not belong in higher education for various reasons. The personal stories and experiences must continue to be documented and told in order to change those people’s views and ideals on PSE for students with ID.

Research Gap

This literature review examined and discussed the limited amount of research surrounding the supports that promote success for students with ID in PSE, which also led to identifying the gap seen within the literature. Specifically, the primary gap being the lack of research regarding supports for students with ID in PSE and the amount of success experienced by students while attending PSE and after graduating. For the purpose of this study, success

refers to a student (a) accomplishing academic goals, (b) accomplishing one or more transition goals, (c) completing the PSE program requirements (i.e. graduation), and/or (d) obtaining employment. The field needs to further investigate why the supports discussed in this literature review help in some settings but not in others, as well as how to group specific supports together so that they may be implemented for student success. Researchers also need to continue to examine the supports that help students across other disability categories be successful in PSE, and how we can generalize those supports for our students with ID.

Program design is another area in which supports are affected. Researchers need to look at how supports are incorporated into specific programs and specific model frameworks. Additional efforts must continue to be made regarding the supports that are necessary for students with ID to experience success while attending PSE and after graduation.

Recent Literature.

Upon analysis of the data from the current study, peer supports and independent living, in the context of on-campus living, were found to be main themes that impact the experience of students with ID while attending a PSE program. Patton (1990) discusses that oftentimes in qualitative research, the literature review does not occur until after data collection. He also mentions literature reviews may occur simultaneously with the data collection. This is done in an effort to support the cyclical and iterative approach in which findings from the data may lead to a need for further research. The researcher completed an updated, smaller scaled literature review focusing on those two specific themes.

Peer Supports.

Griffin, Wendel, Day, and McMillan (2016) published an article in which they described in detail the peer supports model that is used in one specific PSE program for students with ID.

They begin their article by highlighting the limited amount of current research that addresses implementation of peer supports and mentoring for students with ID in PSE. Therefore, many program staff implement programs by trial-and-error and using recommendations from other programs that have implemented a peer support model (Hart, Mele-McCarthy, Pasternack, Zimbrich, & Parker, 2004). While they did not complete a formal study, they did provide anecdotal information from what they have seen as successes and weaknesses with peer support models in their PSE program for students with ID. The successes described are having the ability to reduce the amount of formal support required from PSE staff members. This allows students with ID to look to their same age peers for support when needed. It is also mentioned that the peer support model allows for the natural inclusion of students with ID in the college setting and college life. Some weaknesses discussed are the lack of male peer supports. There are times when PSE staff feel it is necessary to pair a specific student with a specific gender for various reasons. With little selection of gender, this can cause challenges. There is also concerns about when peer supports are volunteers, they are more likely to not fulfill their commitments in its entirety. The researchers suggest that future research on peer supports be immediate and longitudinal. Specifically, research should look at the benefits of peer supports for students with ID and their peers without disabilities that play the support or mentor role.

Jones and Goble (2012) completed a qualitative, phenomenological case study in which they attempted to determine what made the mentoring program at one PSE program for students with ID successful and what changes should be made for future implementation. The researchers used focus groups and surveys to collect data from their 20 participants. The participants included four university professors, four students with ID, three parents, one representative from the disability services office, and 12 peer mentors. After analysis, the researchers found six

overarching categories with several “themed concepts” (p. 272) amongst each. The six categories determined were: (1) preparing for mentoring; (2) teaming, communication, and collaboration; (3) committing to the partnership; (4) trade stereotypes for independence; (5) socialize on campus: All work? No way!; and (6) generate a spirit of inclusion.

During the discussion of the six categories, it was clear that there were strengths and areas for improvement in each. Specifically, in *preparing for mentoring*, participants discussed that they appreciated the orientation in which mentoring was discussed. However, they felt that they needed more targeted training in what was expected of them and whom to go to when they had questions. There was also discussion of the students with ID needing some training or understanding of what the mentor/mentee relationship should look like. The *teaming, communication, and collaboration* category highlighted the need to continue PCP meetings, mentoring plans (schedule of when students with ID should be with a mentor), continuing to collaborate with parents and ensure that appropriate consent is given by the student with ID in order to do so, and keeping open communication with professors. *Committing to the partnership* focused on the need for both the mentor and mentee to work together to make the relationship a positive experience. There was also discussion about how both persons in the mentee/mentor relationship benefit and learn from the experience. Within *trade stereotypes for independence*, professors were discussed again. It is necessary for the professors to be part of the conversation about what the expectations are for the mentor and mentee while in their courses. The professors were also unsure of how to utilize the help of the mentor. The researchers also discussed how students with ID were more successful when their mentor recognized the student’s desire for independence. The main discussion in the *socialize on campus: All work? No way!* category was all about ensuring that the relationship was fun, spontaneous, social, and not all focused on

academics. The final category, *generate a spirit of inclusion* focused on changing the culture of the university and general community by leading by example and using natural supports, just like anyone without a disability does or would do.

From this study, the researchers recommended that future research focus on the effectiveness of peer mentoring relationships, how those relationships impact the student with an ID and the mentor, and what skills do the mentors find they are spending most of their time developing.

On-Campus Living.

Unfortunately, the field is still lacking on literature that provides outcomes and research as it relates to on-campus living for students with ID in PSE. While the researcher was unable to find research specific to the importance of living on or off campus while attending a PSE program for students with ID, there have been several discussions by experts in the field. Hendrickson, Busard, Rodgers, and Scheidecker (2013) looked at the progress of students with ID that attended The University of Iowa. The UI-REACH program allows students to live in the residence hall just like any other student. They believe, “the residence hall and campus (is their) most important classroom.” (p.190) They also noted the, “social adjustment and personal transition to the university and their independence are impacted positively by this integrated residence hall community experience with traditional undergraduate students.” (p. 190)

In a practical guide written by Kelley (2017) five benefits are mentioned in regards to having inclusive housing on PSE campuses: (1) bonding of students, (2) having the full college experience, (3) collaboration amongst the campus, (4) increased service to students, and (5) changes in attitudes of students without disabilities (Barnhill, 2016; Caison, 2005; Hafner, 2008; NSSE, 2011; Westling, Kelley, Cain, & Prohn, 2013). This practical guide makes it very clear

that the benefits of inclusive on-campus living outweigh the risks that concern many university officials.

Some of the concerns of inclusive on-campus living have been brought to the federal courts. Masinter (2010) wrote an article in which he discusses how Oakland University was ordered by a federal judge to provide on-campus housing for a student with ID attending PSE. The university believed they were not required to provide this student on-campus housing because he was not enrolled in a degree program. The student believed he was required to have access to on-campus housing as a student of the university, even though his disability prevented him from enrolling in a degree seeking program. The court determined that the student was correct and should be provided on-campus housing because his disability impacted his ability to meet the requirements for a degree seeking program. The court used the ADA and Section 504 to support their decision, as those specific laws require appropriate accommodations and access to their environment. The housing and degree program were viewed as two separate programs by the court.

As Masinter (2010) discusses, this court case may impact universities willingness to begin new PSE programs for students with ID or even continue to support the current programs they have. Oftentimes, on-campus housing is limited, and universities may worry that if they are to provide housing for all students, including those who are not enrolled in a degree seeking program, they will not have the space or the funding to do so. This is a definite barrier to PSE programs for ID being able to provide on-campus housing for their students.

Although the field of special education has come a long way in the past 15 years in realizing the capabilities of students with ID and by furthering the inclusion movement into higher education, it is important that we continue to engage in this research. As seen by the

limited research found from 2010 to current regarding peer supports and on-campus housing, there continues to be a gap in what is being implemented in PSE programs for students with ID and the outcome research to support it.

Chapter III Methodology

The current study attempts to gain a better understanding of the impact of inclusive PSE on outcomes, including employment, for adults with ID. Specifically, this study focused on addressing the following research questions:

1. What are the life experiences of adults with ID after 1 – 6 years of completing an inclusive, individualized PSE program?
2. How do adults with ID perceive their experiences in PSE influenced their adult life experiences?

Participants

Participants included four adults with Intellectual Disability who had completed an inclusive, individualized PSE program. It was imperative that former students were included as participants; as they are the only participants who could speak about and reflect upon their experiences related to supports, success, and challenges from being fully immersed in a PSE program for students with ID. The parents and/or guardians of the four adults with ID were also interviewed as part of the research study, as well as four staff members who worked with the students with ID during their time in the PSE program. The use of multiple participants who held different roles was important for the depth and perspective of the data. The researcher was able to recruit a total of 13 participants (1 set of parents for 1 of the adults with ID was included).

The viewpoint of the parent/guardian was important to the research study, more specifically gaining their opinion of what experiences they qualified as successes and challenges for students in achieving their goals. The parents/guardians often have an outside view of the challenges and successes that their son or daughter has faced throughout their time in education. The researcher believed that these challenges and successes would come through in the responses of the interview with the parent/guardian and in the themes of the transcripts as well. Oftentimes, program staff see students in a different light than students or parents/guardians will see students. They are the ones who have observed the individual with ID in both familiar and unfamiliar settings where they are included with adults without disabilities (postsecondary education program, workplace, community settings). Their views and perceptions added a unique perspective that helped create a holistic view of the experiences of these individuals with ID.

The primary method of participant selection was done through purposeful sampling, more specifically, homogeneous sampling (Patton, 1990). Homogeneous sampling allowed the researcher to draw in depth data from the subgroup of former students with ID. It also allowed the researcher to understand how the specific experiences of the students PSE programs influenced their time in college as well as their outcomes.

The researcher was able to recruit past students and their parent/guardian by talking with PSE program staff and explaining the research that would be conducted. PSE staff were provided an email script that was used during their initial contact with former students (appendix A). Within that script, PSE staff explained the purpose of the research and what the potential participant would be asked to do. Upon verbal agreement, the researcher then contacted the potential participants (former student, parent/guardian, and staff member) to arrange a time and place convenient for them to complete their interview.

Former Student Participants

Four former students, 1-6 years out from graduating their program, volunteered and agreed to participate in the study. All four participants were white, and three were female and one was male. At the time of the interviews, the former student's ages were 22, 23, 28, and 31. Participant 6 graduated from the program six years ago. Participant 4 graduated from the program four years ago. Participant 26 and 48 attended the program together and graduated one year prior to the interview.

Research Setting

The study took place at a rural university in the Southeast sector of the United States. The university provides an education to an average of 10,000 students (school specific website, accessed on 12/1/2017), with 4 – 8 students enrolled in their PSE program for students with ID each year (4 in their first year and 4 in their second year). The PSE program for students with ID is one of the programs that was partially funded under the TPSID model demonstration program in 2010, in which funding was awarded to higher education institutes that were chosen to create or expand upon already created programs for students with ID (“Transition and Postsecondary Programs...”, 2016). The program continues to serve as a model demonstration program for the state.

PSE Program Design

The PSE program that participants completed “provides a two-year, on campus living and learning experience for college-age persons with intellectual disabilities.” (program specific website, accessed on 12/1/2017). Students have access to all six of the academic colleges at the university and their various courses. Students are able to choose those courses that best align with their personal and career interests. Other students enrolled at the university volunteer and

are recruited to help provide paid and unpaid supports for students who are enrolled in the PSE program. These students assist with on campus living, academic support, engaging in extracurricular activities, becoming members of student organizations, and creating healthy friendships. The PSE program is designed so that students complete a total of 1,800 hours of learning activities as determined through the person centered planning approach. Students with ID are also required to complete a minimum of 80% of objectives as determined by the student and staff members. One main goal of the PSE program is competitive employment. According to thinkcollege.net (April 2017), 100% of students have paid work while participating in this specific university program and 100% of students obtain paid employment upon completion of their program.

Many other PSE programs do not have an on-campus living component with their program due to funding, university policies, or other various roadblocks. Having inclusive dorms is another area in which this specific PSE program provides natural supports in natural environments. Within each dorm, students share a kitchen and cooking space. Each group of students determine a rotation of cooking for the group as well as taking care of their own needs. Students with and without disabilities work together to accomplish the many steps and tasks that are involved in putting a meal together. In the living space, students with ID are sharing rooms with peers without disabilities. This is another area where peer supports are paid to assist with any of the needs that the students with ID may have. One example that a staff member provided was for one student who had trouble staying focused long enough to get himself ready for bed in a timely manner. The peer supports created a schedule in which they would go into his dorm and provide him with verbal prompts to stay or return to task. After approximately two weeks, the

prompting was no longer needed and that student was able to independently manage his bedtime routine.

Research Design

This study implemented a qualitative phenomenological research design (Smith & Fowler, 2009). The use of qualitative phenomenology allowed the researcher to understand and express how former students with ID experienced their postsecondary education programs (Braun & Clarke, 2006). Qualitative phenomenology also allowed the researcher to provide an insider perspective to postsecondary education experiences, as opposed to a quantitative outsider perspective (Brantlinger, Jimenez, Klingner, Pugach, & Richardson, 2005). The researcher is able to express through interpretation and thematic analysis the experiences of former students, their parents/guardians, and staff members who worked with them (Braun & Clarke, 2006). The experiences and outcomes that each individual has provided will help guide the field in what areas of postsecondary education still need improvement in order for graduates to have a positive experience while attending, as well as obtaining and maintaining competitive employment.

Data Collection

Upon receiving approval from Virginia Commonwealth University's Internal Review Board on March 21, 2018, the researcher spoke with the director at the PSE program for students with ID, in order to request her assistance and/or staff assistance in making the initial contact with the former students. The researcher felt it was important that the initial contact come from a trusted individual. This allowed the participant to know the study was valid and understand that this could be another opportunity for them to possibly influence some changes in PSE for students with ID. For the ease of recruiting participants, the director sent an email to former students, their parents/guardians, and staff asking for participation. If former students, parents, or

staff were interested in participating, they were asked to contact the researcher to arrange a specific location and time.

The data collection process for the purpose of this research study included semi-structured, open-ended questions during face-to-face interviews, which align with the methods of applied phenomenology (Thomas & Polio, 2002). Interview length varied depending on the individual participants, but lasted 19 minutes on average. The interview protocol was developed by the researcher with the guidance of other experts in the field of special education, postsecondary education, and ID. The interview protocol consisted of main questions for each participant group (student, parent/guardian, and staff) (Appendices B, C, and D).

Prior to beginning any part of the interview process, the researcher explained the interview process and answered any questions that arose. Each participant was asked to complete an informed consent form after being explained the interview process.

Interviews were conducted and recorded by the researcher. A hired transcription company completed the transcription of interviews. All participants were given the opportunity to review a transcript of their interview for accuracy prior to any analysis. After a preliminary analysis of the interviews, the researcher completed a member check with individual participants to validate the researcher's initial conclusions (Brantlinger, Jimenez, Klingner, Pugach, & Richardson, 2005; Crewsell, 2009, p. 191). After member checks, there were no participants who asked for any changes to be made. Due to the nature of some of the participant's disabilities, the researcher was prepared to modify some of the procedures in order to allow for full participation. For example: allowing transcripts to be read aloud to a participant for member check, a symbol support system for member check, use of a family member or trusted adult for member check, etc. However, upon learning more and meeting participants, modification was not necessary.

Upon beginning review of the transcripts, the researcher believed that a few of the questions were not completely understood by all participants at the time of the interview. Follow up questions were emailed to 7 of the 13 participants with 6 responding and providing further clarification.

Three external auditors unfamiliar with the research reviewed samples of interviews from each group of participants (former students, parents/guardians, and staff). One external auditor was familiar with qualitative research, another with transition of students with disabilities, and the last is a parent of a student with a disability other than ID. The external auditors helped the researcher ensure transcriptions were completed accurately, that there was a relationship between the research questions, that the researcher-identified themes were present and that there were no distinct biases present in the interpretation of the data (Creswell, 2009, p. 192). Another way the researcher ensured credibility of the study was through the use of peer debriefing with someone familiar with qualitative research and students with ID. The peer debriefer reviewed the researcher's themes, analysis, and interpretations of the interviews and helped to ensure that the outcomes of the study and interpretations were meaningful to the field, not just to the researcher (Creswell, 2009, p.192).

The researcher kept a journal to record questions or observations that occurred during the interviews. As interviews took place and document reviews occurred, the researcher noted in the field journal thoughts or ideas that may have been helpful in making sense of information. It was important for these ideas and thoughts to be documented so they could be included in the findings, interpretations, or data analysis section of the research study. This researcher made sure the field journal was both descriptive and reflective. The descriptive field notes included: 1) descriptions of the participant(s), 2) paraphrasing of the interviews and important quotes that

stood out, 3) descriptions of the setting, and 4) description of the researcher's behavior (Bogden & Biklen, 2007). The reflective field notes included: 1) beginning thoughts on analysis, 2) changes or thoughts about the methodology of the study, 3) thoughts on personal values and professional conflicts, and 4) preconceptions of the researcher that may have come to light during the interview (Bogden & Biklen, 2007). Joseph Maxwell (2005) discusses the importance of relationships in gathering interview data from participants. The researcher journaled the process of negotiating the relationship and rapport that was formed with each participant and how that may have impacted the information that the participant was willing to provide to the researcher. Some of the field notes were used to help create follow-up questions as needed.

Data Analysis

A hired transcription company completed the transcription of interviews. The researcher requested that punctuation be transcribed in the way in which it was used by the participant so that a true verbatim account was represented (Braun & Clarke, 2006). The researcher coded for themes without the assistance of a coding program.

In order to develop coding and determine themes, the researcher followed the six-phase framework for thematic analysis. (Braun & Clarke, 2006). In an effort to become familiar with the data, and while waiting for the transcripts, the researcher listened to the interviews and made notes about phrases and topics that continued to come up (Step 1). As the transcripts came back from the transcription service, the researcher read them and began to highlight those phrases and topics that were seen continuously. From this highlighting, the researcher began to develop the eleven codes that were used to help identify themes (Step 2). The substantive coding categories helped the researcher to organize as well as describe the participants' experiences in relation to the questions they had been asked (Maxwell, 2005). The 11 coding categories were identified

as: 1) independent living, 2) employment, 3) education, 4) peer supports, 5) surveys, 6) be like everyone else, 7) person centered planning meetings, 8) staff support, 9) high expectations, 10) inclusion and 11) quality of life.

The researcher then assigned colors to each of the 11 categories. Transcripts were then re-read by the researcher and phrases or words that fell into one of the 11 categories were manually underlined appropriately (Bogden & Biklen, 2007). There were times when words or phrases fell into more than one category, which was marked by the researcher using the assigned colors. The researcher was then able to visually identify the phrases and words that were used most often amongst all participants, as well as each participant group (i.e. former students, parents, and staff). A table was created (appendix E) for the researcher to tally up the words and phrases for each coding category and each participant group. The researcher then began thinking about the relationship between the coding categories, the individual participant groups, and the participant groups as a whole (Step 3). From this step, eight smaller themes were identified: 1) employment, 2) independent living, 3) quality of life, 4) age appropriate relationships, 5) use of learned tools, 6) peer supports, 7) person centered planning meetings, and 8) connections with peers.

These eight smaller themes were then analyzed regarding how they applied to the two research questions (Step 4). The final two main themes were then identified as peer supports and independent living. Step 5 in Braun & Clarke's (2006) framework is to define the themes. For the purpose of this study, peer supports were defined as students without disabilities that worked with the PSE program in some capacity. They were student volunteers, paid supports, work study students, and natural supports through program association. Parents defined independent living as having the ability to take care of one's self in the future. However, the former students and

staff defined independent living as inclusive on-campus housing with peers without disabilities in the present moment. The final step in the framework is to write up ones findings in a detailed analysis. For this study, the detailed analysis consists of retelling the importance of the data, how it relates to the research questions, and how former student's experiences can assist in improving the field and postsecondary education for students with ID.

Confidentiality

Confidentiality was of highest importance at all times. As previously mentioned, the researcher ensured that all participants understood, agreed to, and signed a consent form that outlined and included a section on confidentiality. When the researcher was reviewing participant records, a file was maintained that only identified the participant by an assigned number, and not their actual name. The files for all participants were maintained in a fire-proof file drawer and was only accessed by the researcher. This same level of security was used for all general notes, interview notes, journals, and any other documents or other materials relating to the research.

Validity

In an effort to increase the credibility and trustworthiness of the study's findings and methodology, the researcher interviewed multiple persons from three different groups and analyzed documents (Fielding & Fielding, 1986; Maxwell, 2005; Patton, 1990). This allowed the researcher to not rely on one method of data collection and be able to cross-check findings (Maxwell, 2005; Patton, 1990).

As previously mentioned, it was imperative that students with ID who had completed the PSE program be given the opportunity to express to the researcher how their specific experiences impacted the outcomes of their goals. Including the viewpoint of the parents/guardians of the

students with ID, and the staff members who worked with the former students was important as well. Much of the research (Butterworth, Hagner, Helm & Whelley, 2000; Chadsey & Shelden, 1998; Hagner & DiLeo, 1993; Szmanski & Parker, 1996; Whelley, Radtke, Burgstahler, & Christ, 2003) shows that trusted adult relationships that are held and maintained are one of the important supports that help students during their time in education and employment.

The record review consisted of looking at critical documents that: a) tracked student acceptance into and progress throughout the program, b) described the program, and c) guided ongoing student service delivery. Documents and their importance to the research study are listed in table 4 below. Using this variety of sources allows the researcher to “gain a broader and more secure understanding of the issue *that is being investigated*” (Maxwell, 2005, p. 94).

Table 4.

Importance of Critical Documents

Document	Importance
Person Centered Planning Form(s)	Students are required to participate in a person-centered planning meeting as one of their pre-semester activities. This meeting allows the student to express their interests, their support needs, and what else they feel is important about them that staff should know. These forms are important to the research project as they will allow the researcher to see how the students’ initial goals entering the program aligned with their education through the program as well as their goals upon exiting the program and leading into employment.
Academic Roadmap(s)	Students created a 1 page roadmap that outlined: who they are, who they want to be, their interests/hobbies/curiosities, skills desired to learn/posses, future careers/jobs, and what their overall goal to accomplish is by the time they leave college.

Table 4 (continued).

Behavior Survey(s)

Student supports complete behavior surveys regarding social and independent living skills for the student with ID that they are working with. These completed surveys are used to help monitor students' progress on individual objectives, as well as behaviors that may need to be supported further.

The researcher was given electronic access to the documents listed in table 4 for all four student participants. It is important to note that the behavior surveys were not implemented as part of the program until Fall 2014. Therefore, there were only two behavior surveys for the researcher to review. There was one academic roadmap available for each of the four participants. Students usually complete three academic roadmaps (1 during orientation, 1 during year 1 of program, and 1 during year 2 of program) during their time in the PSE program. However, due to new documents being created throughout program development, some student's records were not all electronic or some students simply did not have three that were completed. Each former student had an abundance of PCP forms that the researcher was able to review.

The record review showed consistency between former student goals from the time they entered the PSE program to the time that they exited. This was also consistent with the information that students, parents, and staff shared during their interviews.

While this research study was conducted in a short amount of time, the researcher was able to implement six of the eleven possible strategies for enhancing the credibility or trustworthiness of empirical qualitative research according to Brantlinger, Jimenez, Klingner, Pugach, & Richardson (2005): 1) Triangulation: the researcher used evidence from multiple data sources, to include several interviews from multiple participants with different experiences and

critical documents in a thorough record review; 2) Researcher reflexivity: throughout the journaling process the researcher worked to identify and be open about the biases/perceptions going into the study and how they may impact the analysis of the data; 3) Member checks: the researcher provided copies of the transcribed interview to each participant for their review prior to beginning any analysis; 4) Peer debriefing: the researcher spoke with colleagues who are familiar with PSE for students with ID and qualitative data analysis for critical feedback regarding data analysis and interpretation; 5) Thick, detailed description: while reporting the study's findings, the researcher used direct quotes and specific descriptions in order to provide a detailed description to support the findings, interpretations, and outcomes; 6) Generalization: the researcher used much description to assist the reader in understanding how PSE may impact students with ID's goals, as well as whether there is a connection between their successful experiences while attending PSE and after graduation.

Chapter IV

Findings

This study explored the impact of inclusive PSE on outcomes, including employment, for adults with ID. With semi-structured interviews (April 2018) and document analysis (September 2018), this researcher was able to collect and analyze qualitative data that supported the research questions:

1. What are the life experiences of adults with ID after 1 – 6 years of completing an inclusive, individualized PSE program?
2. How do adults with ID perceive their experiences in PSE influenced their adult life experiences?

Analysis of the interviews and program documents revealed several small themes and two main themes in regards to former student's experiences while attending PSE programs, life experiences of adults with ID who had completed a PSE program, and transition components such as employment and independent living (U.S. Department of Education, 2017).

Interviews took place during two days in April 2018. The first four interviews with PSE staff members took place on the university campus in their individual offices. The individual offices were located inside an office suite. There was one central area where students and staff could collaborate, work on group activities, or simultaneously complete independent work. This central area also had a receptionist desk that was run by student workers with various shifts.

Within the suite, there were four small offices for individual staff members. However, one office was used as a private workstation with a desk and computer, for part-time staff, student supports, or even students with ID in the program who needed a more private space. Overall, the office was quiet, the phone rang very few times, and it seemed to be a very productive place to work.

The second day of interviews took place at a local country club about fifteen minutes from campus. The PSE program was celebrating their 10-year anniversary that evening with a silent auction, dancing, dinner, and an overview of the last 10 years. Graduates, current students, and their family were all invited to the gala. This allowed the researcher easy access to participants for interviewing. Several parents and graduates agreed to come to the country club during various times of the day to be interviewed. The country club was very large, with two floors, and ceiling to floor glass windows overlooking the golf course. There were deer antler chandeliers, a bar, various seating, and a cut out bay window sitting area. In the sitting area were two couches facing each other, separated by a coffee table. Interviews 1-5 were conducted in the sitting area. During interviews 1-3, there was a baby shower occurring on the far side of the country club. This was not a distraction for the researcher or participants, as the baby shower was far enough away that they could not be heard, and a divider was closing off the area the party was in. The sitting area was designed in a way that the conversations occurring could not be heard by others unless they were in the sitting area as well.

All eight interviews that occurred on day two were completed with minimal to no distractions. The fourth interview for day two was interrupted briefly as someone began testing the sound system for the evening's presentation. During that time, the researcher moved the recording device closer to the speaker and ensured that they were OK proceeding. Interviews 6-8 were closer to the beginning time of the gala; therefore, the researcher conducted these

interviews at one of the tables behind the divider. This helped to minimize distractions of noise and familiar people arriving.

Former Student Participant Stories

Participant 6 attended the PSE program from 2010 – 2012. She was one of the first participants of the program. Although a pilot had been completed with the program and other students, the directors and staff were still in the process of creating and implementing a solid program that met a variety of student's needs. Participant 6 attended a different PSE program prior to being accepted into the one where the study took place. It was clear from Participant 6's mother's interview that the first PSE program she attended was not what the family or student expected. Her mother was a previous special education director for a local public school system and therefore had much knowledge in regards to special education services.

Upon entering into the PSE program where the study took place, Participant 6 was interested in teaching preschool. This was expressed in her interview, as well as her mothers. One specific experience that was discussed was during a PCP meeting there was discussion about what wasn't working and what could be done to improve things. Participant 6 expressed that she was embarrassed and saddened when the preschool students would ask her to read a book to them and she would have to tell them "no" because she was unable to read herself. Immediately, staff jumped into action and provided her with the reading instruction needed to be able to read to the preschoolers. Her mother remembered that experience clearly; as she expressed she had been asking for direct reading services for her daughter for years and was unable to get anyone to listen.

Currently, Participant 6 is working two jobs, one in a grocery store and the other as a preschool assistant. She is currently living with a roommate in a condominium as well. When

reviewing the documents from the document review, there was a clear connection from month to month in regards to strengths, what was working, and what needed to change. Throughout her time in the program, she was consistent with wanting to work in a preschool setting. She not only learned the skills needed to do so while attending the PSE program, but she also had the opportunity to complete an internship in a preschool.

Participant 12 attended the PSE program from 2012-2014 and was the only male student participant. Prior to attending the PSE program, he attended a segregated after care program that both he and his family felt did not meet his needs. Upon discovering the PSE program options, they knew he had to apply. His mother was a strong advocate for the appropriate services and supports for him all throughout his adolescent years. She moved the family from one state to another to ensure that he would receive the appropriate services and supports to assist him in making progress. Upon entering the PSE program, Participant 12 was interested in Criminal Justice, Political Science, and International Politics. Currently, he is working as an administrative assistant for a disability advocacy agency. He has yet to move out on his own away from his mother, but is still working towards accomplishing that goal and living with a roommate.

One of his major successes while attending the PSE program was getting the acceptance policy of a fraternity changed. As a student with ID attending the PSE program, the classes he took were under an “audit” status and therefore he did not have a GPA. One of the fraternity requirements was a specific GPA. Participant 12 believed that this policy was causing an entire population of the university to be excluded and he made a plan to change it. With the help of his fraternity brothers, he was able to start a petition and get the board members to change the GPA requirement. Not only was Participant 12 able to become an official member of the fraternity, but he was able to change a policy that would affect many who would come after him as well.

The final two participants were in the program together from 2015-2017. Participant 26 entered the program with an interest in childcare. However, after learning more skills that applied to childcare and completing an internship, she decided that she no longer had a desire to work in the childcare field. She was very nervous about telling her parents that she wanted to switch her focus from childcare to hospitality. Thankfully, her parents were very understanding and supportive of her decision. The staff was also very focused on ensuring Participant 26 received the most she could out of the program after changing her focus. There was a concern that she would not have enough time to master what was necessary after the change due to the program only being two years. While attending PSE her success and personal focus was to become more social and be involved in as many university activities as possible.

Participant 26 found a significant other while attending PSE and is still in a relationship with the young man. She and her father shared that while they are in a long distance relationship, they do see each other every month under the supervision of one of their parents. Currently Participant 26 is working in hospitality as a kitchen attendant at a local hotel. Each shift she has a task analysis that she completes independently and then reviews with her manager prior to leaving for the day. While attending PSE, Participant 26 learned the importance of using a task analysis.

Similar to Participants 6 and 12, Participant 48 attended a community college program prior to the PSE program used in this study. Upon entering the PSE program, Participant 48 had a goal of owning her own bakery and is currently working in the grocery store baking department. She has recently moved into her own apartment that her parents built for her on their property.

Results by Research Question

When analyzing the transcripts and documents in the context of the two individual research questions, there are a number of smaller themes identified, as shown in Table 5. It is important to note that although themes emerged from each group, the parents and staff were included to help give perspective to the former students' voice. Therefore, not all participant groups provided themes that applied to both research questions. As previously mentioned, the smaller themes seen in Table 5 then led to two major themes, (1) peer supports, and (2) independent living (on-campus living).

Table 5.

Themes by Research Question and Participant Group

Research Question	Themes of Student Participants	Themes of Parent Participants	Themes of Staff Participants
1. What are the life experiences of adults with ID after 1 – 3 years of completing an inclusive, individualized PSE program?	<ul style="list-style-type: none"> - Employment - Independent living - Quality of life - Use of learned tools 	<ul style="list-style-type: none"> - Employment - Independent living - Quality of life - Age appropriate relationships - Use of learned tools 	Not applicable
2. How do adults with ID perceive their experiences in PSE influenced their adult life experiences?	<ul style="list-style-type: none"> - Connections with peers - Peer supports - Use of learned tools 	<ul style="list-style-type: none"> - Peer supports 	<ul style="list-style-type: none"> - Peer supports - Independent living - Person centered planning meetings - Employment

Themes Related to Supports that Promote Success for Students with ID

Employment.

While students and parents both discussed employment during their interviews, it is important to note that students talked about employment as a previous goal and where they were

currently working. Whereas parents talked about employment as where they are currently working and where they would like to see them go in their future.

All four former students mentioned where they were currently working. There was consistency from the document review showing that all of the former students were currently working in the field in which they studied while in PSE. Two parents expressed disappointment with the number of hours that their child was currently working. “She’s got a job, but her hours are so...they over hired and understaffed...therefore, as at any retail, her hours get cut.” Another parent mirrored these feelings in that his child is not making enough money “to really meet her goal...that she could afford an apartment with a roommate.”

One of the PSE staff mentioned how there is still disconnect between the actual transition from K-12 to college.

...for employment I get very uh, almost crushed. Because I see sheltered workshop as a goal on some of the IEPs that we’ve gotten. Uh, one example that really hits home for me is the one who has now got a full-time job with benefits and he’s driving and he has his own vehicle. And, uh, I can show you in his report it say’s he’s –his suggested employment is a sheltered workshop. So he definitely went beyond the paper.

One of the program goals is for students to be employed, working 20 or more hours a week, and getting paid. One has to wonder where the breakdown occurred between the IEP transition goals and the student wanting to attend a PSE program.

Independent Living (on-campus living).

On-campus living was one of the areas that came out to be most important to all three participant groups. One former student stated specifically that the social aspect was one of her goals when entering PSE. It was clear that she enjoyed the freedom that PSE has and from

having the ability to live on campus. “I wanted to have a lot of friends and maybe just like tour the campus and tour around the schools and just have like your own life that you did at home and just with no parents around.” One parent commented:

He influenced people who are not education majors, psych majors, speech and language majors. They are people who are chemical engineers, lawyers. You know, in fields that might one day be his landlord. They might one day be his next-door neighbor. And they may have never had a family member or crossed paths with someone with a disability, but they know him. And I think it’s because, again, he lived in a regular dorm. He ate in the cafeteria with everybody else. And I think that’s what makes it so important.

Program staff believe on-campus living is a very important piece of the program that impacts how much students learn and how successful they are.

I think the residential piece is like a huge piece. Like if it was a community college and they were coming every day and then going home, it would be super different. Um, because they really get to like come into their own and like figure out –like learn a lot about themselves.

Quality of Life.

“...or you know, maybe even eventually get married.” This was part of a statement made by one of the parents when asked what their goals were for their child. All of the parents expressed similar goals for their children. Words and phrases like, “social”, “healthy”, “self-sufficient”, and “being around other people” were used by the parents throughout their interviews.

The former students talked about quality of life several times, specifically in relation to “meeting new people,” “making new friends”, and “being independent”. When one of the former

students was asked if she had accomplished her goal of becoming more social and if it helped her in her life after college, she stated:

Yeah, because I went to college, I graduated, and I came home. And I – now I hang with friends every day. I go – I sometimes go to dinner with friends. I'll go out with friends at home, and I socialize, you know? I hang with my family and that kind of stuff.

Use of Tools Learned in PSE.

While discussing goals that were accomplished in PSE that have helped with life after college, one parent and one former student specifically mentioned the use of a task analysis. The former student was describing her current workplace and how she has, “a checklist and I have to check it off, and then give it to a manager, and then they have to check it off to say we did the work.” She believed that this was helpful to her while in PSE and in her current workplace. The parent discussed how her child had made progress in PSE on keeping her dorm room clean. However, at home they were still working on perfecting the cleaning process. In an effort to help her daughter, the parent was going to recreate the task analysis that she had used in PSE. “Well it was a task analysis. It was a list of things to do in the shower and they'd laminate it and stuff. And that's still in her head. She remembers that.”

PSE staff discussed how the program is designed for students to learn new strategies that apply to everyday life and independent living. The goal is for them to use what they have learned after graduation as well.

So we kind of move from like learning those skills to now what can you take with you after you graduate so that you can keep using that, you know? And making sure that you're like thinking like do you need a task list to take with you when you graduate.

Age Appropriate Relationships.

Former students did not discuss age appropriate relationships. However, this was identified by the researcher as a smaller theme that parents found important. One parent spoke about relationships in regards to love interests. “She does actually have a boyfriend that she met in the program. He was in the program too, and they graduated together last May.” This specific relationship was also brought up by one of the staff members during their interview. They mentioned that there was a need to counsel both former students in how to have a relationship and maintain their own independence. Another parent talked about how she wanted her son to experience everything like other college students would, as those experiences were age appropriate. “I remember getting the call one time where he got to go out with a fraternity. And I was advised you know there may be alcohol involved. And I said that’s fine. That’s part of college.”

Peer Supports.

When former students were asked to specifically describe the support or help that was most helpful for them in college, all four stated that the peer supports were most helpful. They mentioned that the peer supports were helpful in reaching their goals, completing homework, providing rides into town, and life in general. “They helped me a lot. They changed by life a little bit.”

During the individual parent interviews, each parent specifically mentioned the student supports as important in their students success while in the program. They talked about how peer supports were available to “talk when [they] were unhappy with something in the program”. When student participants expressed being unhappy with a part of the program, the student supports would work together with program staff to find a resolution or look at the problem to

see if a change needed to be made within the program. It was clear that the PSE program was constantly changing based on the individual needs of the students, and the feedback of those involved.

As previously mentioned, the PSE program has 250 paid and volunteer peers who work with the students with ID. Their “peers are teaching them more than we can ever teach them.” In the dorms, the peer supports are living with, cooking, cleaning, and assisting with many other facets of independent living. One of the staff was asked how she would improve the program if she were given unlimited funds. Her response was helpful in understanding the importance of the peer supports:

I wouldn't want to put all my money into full-time staff when the peers are the ones really doing what they need to do. I'll invest more in that because it's very powerful...Our job is kind of to be behind the scenes and supporting them from behind, but not letting them really know we're supporting them. That's why I call it the air conditioner model. You kind of know when it turns off, but you don't when it's on. You just ignore it. So we like that role, and we walk that tightrope.

Connections with Peers.

Former students also discussed how they are still in contact with one or more of the friends (with and without disabilities) that they met while in PSE. One former student mentioned that he likes “being able to hang out with my brothers and express my interests.” Another stated that she still “texts or calls” her support. These examples and the informal observations that the researcher made at the gala, help to show that students with ID are making genuine friendships with their peers that last beyond graduation.

Person Centered Planning Meetings.

Person centered planning meetings were discussed by all four of the staff participants as an important component of the PSE program and in leading to student success. These meetings are held monthly and include the student, staff, parents, employers, and any others that the student would like present to give input. During PCP meetings, the team works together to help students evaluate goals, adjust goals, and set new goals as necessary. One staff participant stated “...but it allows us not to let them get too far into “I need help and I’m in a mess.” They reflect before it becomes a bigger issue.”

Summary

This study used interviews with twelve participants who were involved in PSE for students with ID to collect data about their experiences with one PSE program and its impact on students’ adult lives. The researcher informally observed interactions on campus and at a formal gala between staff, peer supports, students with ID, and parents. The findings reported in this chapter were based on the researcher’s evaluation of program documents and semi-structured interviews. Thematic coding methods (Bogden & Biklen, 2007; Maxwell, 2005) were used to identify themes amongst and across each participant group.

This study implemented a qualitative phenomenological research design (Smith & Fowler, 2009). The use of qualitative phenomenology allowed the researcher to understand and express how former students with ID experienced their postsecondary education programs (Braun & Clarke, 2006). Qualitative phenomenology also allowed the researcher to provide an insider perspective to postsecondary education experiences, as opposed to a quantitative outsider perspective (Brantlinger, Jimenez, Klingner, Pugach, & Richardson, 2005). The experiences and outcomes that each individual has provided will help guide the field in what areas of

postsecondary education still need improvement in order for graduates to have a positive experience while attending, as well as obtaining and maintaining competitive employment.

Limitations

Although the researcher intended on conducting a research study that was both credible and trustworthy throughout the design, implementation, analysis of data, and interpretation of results, it should be noted that the study does have some limitations. Several assumptions were also made while planning and conducting this research study: (1) researcher assumptions and prior experience, (2) prior beliefs and personal motivation, (3) voluntary participation and participant self-report, (4) disability category and use of one program, and (5) the absence of observation.

Researcher Assumptions and Prior Experience.

It was important for the researcher to understand her own assumptions in order to limit personal bias during the study. The researcher's assumptions in regards to her own experiences, values, and biases may have influenced the data analysis. This process also allowed the researcher to self-reflect on any influence her assumptions may have had on the approach and design of the study. The researcher's first five years of teaching were spent working with students with moderate and mild ID in a high school. During this time, the researcher learned of postsecondary options for students with ID and began to wonder why no one had pushed the students she was working with towards postsecondary education before. After learning more about available programs close to where the high school was located, the researcher then began asking more questions of her seasoned colleagues, specifically those with transition expertise.

Through questioning and discussions with experts in special and higher education, the researcher learned about the various models of postsecondary education for students with ID.

She found that she preferred the inclusive individual supports model, but could also understand the importance of having different models to allow for student and family choice.

Prior Beliefs and Personal Motivation.

Throughout the researchers teaching experience, it was observed that too many educators and families did not have high enough expectations for students with ID. There was an overall belief that postsecondary education was not meant for students who did not receive a diploma like their peers without disabilities. Educators and families seemed unsure of what a young adult with ID would gain from attending postsecondary education. By learning more about options available, the researcher was able to have open discussions with educators, students, and families about postsecondary education and how to make what they believed was the impossible, possible.

The more the researcher learned about PSE for students with ID, the more she wanted to be part of the movement. The researcher continued to learn as much as possible about the new opportunities available for students by visiting programs, talking to current students, families, and experts in the field. There was never a time that the researcher could think of a reason for postsecondary education to not be available for students with ID. The researcher believed and continues to believe that a disability should not stop anyone from experiencing any part of life, including education.

Voluntary Participation and Participant Self-report.

Participants were contacted by an email from the program director in which they were asked if they were interested in participating in a research study. If they were interested, they were given the researchers contact information. There was ever any compensation or incentive offered to participants. The information that participants provided led to valuable and meaningful

findings. However, the external validity may be limited due to an inability of the participant population not being representative of all postsecondary education programs for students with ID. It is also a challenge to state that the outcomes could be generalized across programs that follow the same model and implementation.

All participants provided their recollection of events, activities, and experiences that happened to the best of their abilities. This again limits the external validity of the study due to the research study being conducted in one university, with graduates, parents, and staff of one program.

Disability Category and Use of One Program.

Another limitation that occurred was in relation to the external generalizability of the outcomes (Maxwell, 2005). Due to the research study focusing on students who attended one PSE program for students with ID and not multiple programs across various states, the outcomes do not represent a whole picture of PSE programs for students with ID. However, it is important to note that the researcher focused on limited generalizations and “the effectiveness of specific interventions” (Patton, 1990, pg. 156) in regards to students with ID in PSE programs. The researcher aimed for the analysis and interpretation of results to lend themselves to be mirrored across PSE programs and for students with ID accessing PSE, no matter what model the program uses.

Absence of Observation.

While validity and credibility of the study was planned for by interviewing three different populations of participants, as well as a thorough document review, one limitation was the absence of observation. Observation often allows the researcher to gain different perspectives on what is occurring in the specific situation being studied (Maxwell, 2005). Unfortunately, due to

the student participants having completed the PSE program for students with ID already, it was impossible for the researcher to observe the participants in that specific educational environment. However, the researcher was present for one academic day and one social activity in which there was an opportunity to informally observe current students in their program. These observations were not included in the data analysis, but a relationship between the study findings and what was observed, could be discussed further by the researcher in a later research project.

Chapter V

Conclusion and Implications

The purpose of this study was to explore and understand the experiences and supports that lead to success for students with ID while attending postsecondary education. Research has shown that postsecondary education improves the long-term economic benefits, health, quality of life, community participation, independence, self-esteem, friendships, and professional relationships of person's with and without disabilities (Baum & Ma, 2007; McMahon, 2009; National Center for Educational Statistics, 2006). Webb et al. (2008) discuss various research studies that have focused on the experiences and needs of students with high incidence disabilities while attending postsecondary education. However, there continues to be a lack of research regarding the experiences and needs of students with ID in postsecondary education. The researcher used the phenomenological approach for this study to research what components of postsecondary education programs for students with ID led to positive experiences for students. Specifically, what did the former students, parents, and staff believe led to students being successful while attending postsecondary education and in obtaining employment.

Discussion

The findings from this study provide an insight for better understanding of the experiences of students with ID while attending postsecondary education and how their success was impacted from those experiences. The researcher used the perspective of former students, parents, and staff, as well as program documents, to gain a broader view of the experiences and how they promoted student success. The experiences of the participants in this study could serve as a guide for program directors and staff when determining the makeup of their program and

different options for students. In addition, prospective students and families looking into postsecondary education can use the experiences of the participants to assist in their search for the right program for their specific needs.

A summary of the results by specific research questions are as follows:

1. What are the life experiences of adults with ID after 1 – 6 years of completing an inclusive, individualized PSE program?

The researcher found four themes (employment, independent living, quality of life, and use of learned tools) amongst parent and former student participants in which both groups stated similar life experiences. Parents also stated age appropriate relationships as a theme that was not seen from student participants. Table 6 illustrates previous research discussed in the literature review that support or recommend the same themes found in the current study.

2. How do adults with ID perceive their experiences in PSE influenced their adult life experiences?

Amongst all participants, the researcher found one theme (peer supports) in which all three participant groups stated similar experiences influencing adult life experiences. Former students also stated connections with peers and the use of learned tools, which were not noted by parent or staff participants. Staff stated independent living, employment, and person centered meetings, which were not noted by former student or parent participants. Again, table 6 illustrates previous research discussed in the literature review that support or recommend the same themes found in the current study. The current study helps reinforce what previous literature has suggested should be a focus of postsecondary education programs for students with ID.

Table 6.

Previous research that supports current study outcomes for research questions

Question 1	<i>Employment</i>	<i>Independent Living</i>	<i>Use of Learned Tools</i>	Quality of Life	Appropriate Relationships
	<ul style="list-style-type: none"> • Gilmore, Bose, & Hart (2002) • Grigal (2009) • Migliore, Butterworth, & Hart (2009) • Petcu, Chezan, & Van Horn (2015) • Ross, Marcell, Williams, & Carlson (2014) • Smith, Grigal, & Sulewski (2013) • Wehman & Scott (2013) 	<ul style="list-style-type: none"> • Paiewonsky (2011) • O'Brien et al. (2009) • Thoma (2013) 	<ul style="list-style-type: none"> • Mazzotti et al. (2015) 	<ul style="list-style-type: none"> • Jorgenson, et al. (2009) • Hart, Grigal, & Weir (2010) 	<ul style="list-style-type: none"> • Copeland et al. (2002) • Butterworth, Hagner, Helm & Whelley (2002) • Cadsey & Sheldon (1998) • Hagner & DiLeo (1993) • Szymanski & Parker (1996) • Eisenman et al (2013) • Whelley, Radtke, Burgstahler, & Christ (2003) • O'Brien et al. (2009)
Question 2	Peer Supports	Connections with Peers	PCP Meetings		
	<ul style="list-style-type: none"> • Paiewonsky (2011) • O'Brien et al. (2009) 	<ul style="list-style-type: none"> • Paiewonsky (2011) • O'Brien et al. (2009) • Carroll, Petroff, and Blumberg (2009) 	<ul style="list-style-type: none"> • Weir (2004) • Mazzotti, Kelley, & Coco (2015) 		

* *Italicized themes were seen as outcomes in both research questions 1 and 2.*

Interpretation of Results

While table 6 helps to connect the research from the literature review to the outcomes of the current study, it is important to focus on the findings from the current study that arose from interviews and program document analysis: (a) peer supports and (b) independent living. Several other themes were identified; however they were not presented as clearly as peer supports and independent living. All three participant groups identified these themes as important or must-have experiences that led to success while attending postsecondary education.

Peer Supports.

“...sometimes it’s peers just cheering them on or them seeing a peer doing it that they are really impacted by...” Former students and staff reported peer supports to be the most important experience that led to success for them or their child while attending postsecondary education. Parents reported peer supports as the third most important. Results from this study show that students with ID need to not only be surrounded by their same age peers without disabilities, but they need to be involved in appropriate and meaningful relationships.

Research (Grigal et al., 2013) has shown that many postsecondary programs are including peer mentors or supports for students with ID as a program component (Griffin, Wendel, Day, & McMillan, 2016). Carter, Sisco, Chung, & Stanton-Chapman (2010) discuss the various literature within special education that shows the effectiveness of peer support and different peer support models. However, much of that research was conducted in K-12 education. As the current study shows, extending a peer support model into postsecondary education programs for students with ID is successful and seen as a component that leads to student success in postsecondary education as well as adult life and employment.

Independent Living.

“Hey, I’m going to get my own apartment. Can we talk about leases and monthly budgets and figuring this out?” Parents reported independent living as the most important experience that led to success for them or their child while attending postsecondary education. With former students and staff reporting independent living as the second most important experience. There was much discussion from parents about how one of their long-term goals for their children was for them to be able to live independently. This was seen in the interviews with staff and former students as well. Not only were they learning to appropriately interact with peers, but also they were learning how to cook, grocery shop, budget for wants and needs, clean, do laundry, etc. Some of the staff even mentioned two former students who had moved into apartments of their own. They would stay in contact with the staff and reach out for assistance as needed. However, they were successfully employed and living independently.

Research has shown that adults with ID often lack independent living skills when compared to adults without disabilities (Bouck, 2010; Liss et al., 2000). There is also a concern of students and adults becoming dependent on prompting from peers or adults to complete specific tasks for them (Giangreco & Broer, 2007). The specific program where this study was conducted has avoided this dependency by appropriately training peer supports in assisting their peers. Fading of supports is also strongly encouraged by program staff. Students, staff, and parents also report the use of strategies that can be implemented independently (i.e. task analysis, scheduling tools, electronic prompting). This study shows postsecondary education programs that incorporate independent living and on-campus housing as a required component leads to success in the program and in future adult life.

While this study aimed to find what experiences lead to success for students with ID in postsecondary education, the researcher believes it to be important to discuss the experience that came out as least important or low for each group of participants; education.

Education.

Research continues to show that postsecondary education improves the long-term economic benefits, health, quality of life, community participation, independence, self-esteem, friendships, and professional relationships of person's with and without disabilities (Baum & Ma, 2007; McMahon, 2009; National Center for Educational Statistics, 2006). When looking at the eight outcomes listed, none of them is academic in nature. They are all skills or parts of one's life that are usually gained from life experiences. The researcher believes that parents, former students, and staff all feel that education is important, however, that is not the main purpose of students with intellectual disabilities attending postsecondary education. As seen from the themes of the interviews, the purpose is for life experiences with same age peers, which lead to independent living and employment.

One may ask, if this study found that education was not the main purpose of students attending postsecondary education, then why continue to have these programs? This researcher believes the many components that make up postsecondary education are important and work together to make all of the outcomes successful. While students are not attending postsecondary education for the knowledge they learn in classes, they are attending for the experiences that occur within the classroom and throughout the campus. This researcher would again ask the reader to think about their own experiences with postsecondary education and where they experienced most of what helped shape their lives; was it in the classroom or through campus interactions (i.e. friendships, clubs, outings, employment)?

Practice

Due to this study taking place at one university where participants voluntarily self-reported, the findings cannot be recommended to change specific practices with certainty. However, the researcher does believe that this study's findings support the need for age appropriate peer supports to be included in postsecondary programs for students with disabilities. Previous research supports (Carter, Sisco, Chung, & Stanton-Chapman, 2010) the use of peer support models for students with intellectual disabilities in K-12 educational environments. It would make sense to continue this practice from K-12 into the postsecondary education setting as well. The current study further supports that a peer support model in postsecondary education contributes to student success in personal and professional lives. This can be heard in some of the students statements about several of their peer supports being their "friends", doing "activities off campus" with them, and even "changing [their] life".

Policy

As discussed earlier, it is important to remember that there currently are not any laws in place that specifically mandate that student with ID receive or have access to postsecondary education. The lack of requirements for access to postsecondary education could lead to current programs losing funding and no longer being able to provide services for students. This reinforces the need for outcome-based research to continue being conducted. There is a need to continue showing, through research, the many positive outcomes that postsecondary programs have on the future and lives of students with ID.

One of the key activities of the National Coordinating Center for TPSIDs is to "update program standards and data collection protocols for TPSID programs, and use these to collect, analyze, synthesize, and report annual and longitudinal follow-up quantitative and qualitative

data on TPSID program components and student outcomes” (www.thinkcollege.net, November 2018). It is imperative that the National Coordinating Center continue these activities, as many programs, educational systems, and families look to the information they disseminate to make critical decisions, especially positive outcome based data.

Future Research

deFur and Korinek (2008) state, “two decades of research show that young adults who participate in postsecondary education are more likely to develop attitudes and skills related to the ongoing career development and lifelong learning necessary for successful employment, community living, and personal fulfillment” (p. 188). We must continue to build on that research, find the implications, and make connections as to how PSE can continue to impact the goals of students with ID in the same way that they are impacting others.

For some students with ID, PSE may be the first time that they are given a chance to be independent and make their own decisions about their lives. Research needs to be conducted to determine whether that level of independence provided during PSE experiences is different from independence in other settings and the impact this has on student outcomes beyond personal satisfaction. This environment must be created and built in a manner of which the key players are prepared to help support those students in accessing the education in which they desire.

The conclusions and findings of this phenomenological study leads to other areas of research that should be explored. In discussing the findings from the current study, peer supports and independent living were the main themes of importance to participants. When attempting to generalize or apply these findings to other programs, it will be important for other researchers to question specifics of these two themes. Some questions this researcher believes would be important are:

Peer Supports.

- How do peer supports impact learning and maintaining independent living skills while attending postsecondary education?
- Are the friendships formed by peers with and without disabilities in PSE long lasting or do they fade upon exiting the program?
- Are the personal skills learned while working with peer supports in PSE continued to be used while forming other relationships upon exiting the program?

Independent Living.

- How are independent living skills learned while attending postsecondary education?
- Do the learned independent living skills learned in postsecondary education continue to be used upon exiting the program?

Education.

- Why does education fall so low in regards to an experience of importance when compared to other experiences?
- Can education or any of the transition components be viewed independently when discussing students with ID and transition? Do they work too closely together to be separated into specific components?

It is important for further research to be conducted in the same manner as the current study. This researcher was unable to find any other in-depth qualitative studies that looked at the student perspective of their experiences while in postsecondary education. Having a number of studies that look at the student perspective would further assist program directors and staff to develop and implement programs that positively impact prospective students and their outcomes. Finally, the research that was conducted for this study should be expanded to multiple programs

of various models. Comparisons should be made amongst parents, former students, and staff of multiple programs to help determine similarities in specific experiences and supports that promote success for students with ID in postsecondary education.

Conclusion

This research study has revealed that peer supports and independent living contribute to success for students with ID in postsecondary education and in their life experiences upon leaving postsecondary education. Specifically, having students with ID fully immersed in their postsecondary experience with their peers without disabilities is a component that could lead to success. This includes courses, living arrangements, clubs, sororities, fraternities, and many others. Students, parents, and staff all agree that peer supports and independent living are important components of postsecondary programs. They are also in agreement that postsecondary education is not about what is learned in the classroom in regards to academics. This researcher assumes that if asked, each participant group would discuss education as a cyclical experience in which all of the areas of postsecondary education combine to create an overall experience. An experience that influences an individual's life while attending postsecondary education and after.

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Appendix A

Telephone and/or Email Script

Study Title: The Experiences that Promote Success for Students with Intellectual Disability in Postsecondary Education

(The following will be read slowly and directly to the participant by the program staff. If being sent electronically by email, the script will be pasted into the email.)

You are invited to participate in a research study being conducted by Kimberly Handsome (Boyd), a Doctoral student at Virginia Commonwealth University.

This study will happen one day during the weekend that you attend the 2018 Benefit Gala. You don't have to be in the study if you don't want to. If you don't want to be in the study, you can still attend the Gala.

If you decide to be in the study, you will answer some questions about your experience in your college program (student), OR your child's experience in their college program (parent). The conversation will be audio-recorded. This will allow the researcher to listen to your conversation at a later date.

May I pass along your contact information to Kimberly Handsome (Boyd) so that she can set up a time to meet with you during the weekend of April 6 – 8 or so she can answer any questions you may have?

[If sending email] A copy of the study consent form is attached to this email.

Appendix B

STUDENT INTERVIEW QUESTIONS

1. Where are you currently working?
 - a. How long have you worked there?
 - b. What are your responsibilities?
 - c. How many hours do you work per day or week?
- If student responds that they are not working:
 - d. Have you tried to find a job?
 - e. Where have you tried?
 - f. Do you know the reasoning for not being hired (if they were interviewed)?
 - g. What are you doing instead of working?
2. What is your current living situation?
 - a. Do you live independently? With a roommate? With family?
3. Why did you choose to attend college?
4. What were your goals when you entered college? What were you hoping that college would do for you?
 - a. Specifically for your education?

- b. Specifically for your career or future employment?
 - c. Specifically for your independent living or social life?
5. How did you set your goals for college?
- a. Did you set them up independently or did someone help you? Can you describe that process?
 - b. Did you think about how you would know when your goals had been met? Can you describe how you knew?
6. As you continued through college, how do you think your goals (refer back to the goals in question #5) changed?
- a. For education (describe the answer from #5)?
 - b. For employment (describe the answer from #5)?
 - c. For independent living (describe the answer from #5)?
7. Can you describe the kinds of support you received that was most helpful for you in accomplishing your goals?
8. Tell me about a time while you were in college when you felt you needed more support or help than you were getting.
9. Tell me about a time while you were in college when you were really proud of achieving a goal.
- a. Who helped you reach that goal?
 - b. What supports helped you reach that goal?
 - c. Can you think of any obstacles that you came up against while working towards that goal?
 - d. How did you overcome those obstacles?

- e. How has accomplishing this goal helped you in your life after college?
10. If you could design a college program for students with intellectual disabilities, or abilities similar to you, what would that program look like?
- a. What would colleges need to do to make that program successful?
 - b. What would the staff need to do to help students while they are in college?
 - c. What would students need to do to accomplish their goals while in college?
11. What else would you like to tell me about your experiences as a student with a disability attending college?

Appendix C

PARENT INTERVIEW QUESTIONS

1. Tell me about the process you and your child went through to determine that college was the right step after high school.
 - a. What was the reason for you or your son/daughter for choosing postsecondary education?
2. What were your goals for your son/daughter when they entered college? What were you hoping that college would do for them?
 - a. Specifically for their education?
 - b. Specifically for their career or future employment?
 - c. Specifically for their independent living or social life?
3. How did you support your son/daughter in setting their goals for college?
 - a. Did you allow them to set them independently or did you provide guidance? Can you describe that process?
 - b. Can you describe how you knew when your son/daughter had accomplished their goals?
4. As your son/daughter continued through college, how do you think their goals (refer back to the goals in question #2) changed?

- a. For education (describe the answer from #2)?
 - b. For employment (describe the answer from #2)?
 - c. For independent living (describe the answer from #2)?
5. Can you describe the kinds of support that your son/daughter received during college that was most helpful for them in accomplishing their goals?
6. Tell me about a time during your son/daughters postsecondary education experience when you felt they needed more support or help than they were getting.
7. Tell me about a time while your son/daughter was in college when you were really proud of them for achieving a goal.
 - a. Who helped them reach that goal?
 - b. What supports helped them reach that goal?
 - c. Can you think of any obstacles that your son/daughter came up against while working towards that goal?
 - d. How did they overcome those obstacles?
 - e. How has accomplishing this goal helped them in their life after college?
8. If you could design a college program for students with intellectual disabilities, or abilities similar to your son/daughter, what would that program look like?
 - a. What would colleges need to do to make that program successful?
 - b. What would the staff need to do to help students while they are in college?
 - c. What would students need to do to accomplish their goals while in college?
9. What else would you like to tell me about your experiences as a parent of a student with a disability attending college?

Appendix D

STAFF INTERVIEW QUESTIONS

1. Why did you choose to work in a postsecondary program for students with intellectual disability?
2. What are the program goals? What should students obtain from this program?
3. Describe how student goals are determined and how it is ensured that they align with program goals?
4. Can you describe how student goals are monitored? Does staff complete most of the monitoring? Does the student complete most of the monitoring?
5. Can you describe how students' progress with program goals is monitored?
6. Can you describe how staff knows when student goals have been met?
7. Can you describe how staff knows when program goals have been met by individual students?
8. Thinking about all of the students that you have worked with while they were attending a postsecondary education program, what would you say are the most common goals when they entered the program?
 - a. Specifically for their education?
 - b. Specifically for their career or future employment?

- c. Specifically for their independent living or social life?
- 9. As students continued through college, how do you think their goals (refer back to the goals in question #5) change?
 - a. For education (describe the answer from #5)?
 - b. For employment (describe the answer from #5)?
 - c. For independent living (describe the answer from #5)?
- 10. Please describe the overall common supports or help that students received that was most helpful in accomplishing their goals?
- 11. Please provide an example of a time when a student required more support or help than they were getting. What did you or other staff do to assist the student?
- 12. If you could design a college program for students with intellectual disabilities, what would that program look like?
 - a. What would colleges need to do to make that program successful?
 - b. What would the staff need to do to help students while they are in college?
 - c. What would students need to do to accomplish their goals while in college?
- 13. What else would you like to tell me about your experiences as a staff member working with students with disabilities that attend a postsecondary education program?

Appendix E

	Independent Living	Employment	Education	Peer Supports	Surveys	Be Like Everyone Else	PCP Meetings	Staff Support	High Expectations	Inclusion	Quality of Life
All											
Parent											
Student											
Staff											

Appendix F

RESEARCH STUDY INFORMATION AND CONSENT

The Experiences that Promote Success for Students with Intellectual Disability in Postsecondary Education

PRINCIPAL INVESTIGATOR: Colleen Thoma, Ph.D.

VCU IRB No.:

If any information contained in this information sheet is not clear, please ask the researcher to explain any information that you do not fully understand. You may take this consent form and think about whether you would like to participate before making your decision.

PURPOSE OF THE STUDY

The purpose of this research study is to see what postsecondary education experiences promote success for students with intellectual disability. You are being asked to participate in this study because you have either a) graduated from a postsecondary education program, b) are the parent/guardian of someone who has graduated from a postsecondary education program, or c) a faculty member who worked with one or more of the participants while they attended the postsecondary education program.

DESCRIPTION OF THE STUDY AND YOUR INVOLVEMENT

In this study you will participate in a one-on-one interview with the researcher. The interviews will be recorded and transcribed and should take no longer than an hour. You will have the opportunity to review the transcriptions of your interview for accuracy. The researcher will be asking questions about:

Student: your goals, experiences, and the kinds of support you received while in college

Parent: your goals for your child, your child's goals, and your experience of having a child with an intellectual disability attend college

Faculty/Staff: program goals, student goals, and program supports

For students, the researcher is also going to review documents specific to the program you participated in. Specifically, they will look at your person centered planning documents, education coach documents, and any application documents for job placement or internships.

RISKS AND DISCOMFORTS

The only known risk of participating in this study is a potential breach of confidentiality. However, all interview audio recordings and transcripts will be password-protected

BENEFITS TO YOU AND OTHERS

You may not receive any direct benefit from this study, but the information learned from this study will help the field of special education to further improve postsecondary education experiences for students with intellectual disability.

CONFIDENTIALITY

Potentially identifiable information about you will consist of interview recordings, interview transcripts, and a file review. Data is being collected only for research purposes. Your data will be identified with a random number that will be created through a random number generator. The data will then be stored on a password protected computer and in a locked office. We will not tell anyone the answers you give us; however, information from the study may be looked at or copied for research or legal purposes by Virginia Commonwealth University.

VOLUNTARY PARTICIPATION AND WITHDRAWAL

Participation is voluntary. You do not have to participate in this study. If you choose to participate, you may stop at any time. You may also choose to withdraw or not to answer particular questions that are asked in the study. There is no penalty to you if you decide not to participate or to withdraw from the study.

QUESTIONS

If you have any questions, complaints, or concerns about your participation in this research, contact:

Kimberly S. Handsome
boydks@vcu.edu
(804) 869-8777

Colleen A. Thoma, Ph.D., FAAIDD
cathoma@vcu.edu
804-827-2651

The researcher/study staff named above is the best person(s) to call for questions about your participation in this study.

If you have any general questions about your rights as a participant in this or any other research, you may contact:

Office of Research
Virginia Commonwealth University
800 East Leigh Street, Suite 3000
Box 980568
Richmond, VA 23298
Telephone: (804) 827-2157

Contact this number for general questions, concerns or complaints about research. You may also call this number if you cannot reach the research team or if you wish to talk with someone else. General information about participation in research studies can also be found at <http://www.research.vcu.edu/irb/volunteers.htm>.

CONSENT

I have been given the chance to read this form. I understand the information about this study. Questions that I wanted to ask about the study have been answered. My signature says that I am willing to participate and/or for my child to participate in this study. I will receive a copy of the consent form once I have agreed to participate.

Participant name printed

Participant signature

Date

If the student participant cannot provide informed consent form themselves, their legally authorized representative will also need to complete this following signature section.

Name of Legally Authorized Representative (Printed)

Legally Authorized Representative Signature

Date

Name of Person Conducting Informed Consent Discussion (Printed)

Signature of Person Conducting Informed Consent Discussion

Date

Principal Investigator Signature (if different from above)

Date

Appendix G

Definition of Terms

- *Comprehensive transition and postsecondary program for students with ID* - a degree, certificate, or non-degree program that is-
 - (A) offered by an institution of higher education;
 - (B) designed to support students with ID who are seeking to continue academic, career and technical, and independent living instruction at an IHE in order to prepare for gainful employment;
 - (C) includes an advising and curriculum structure; and
 - (D) requires students with ID to participate on not less than a half-time basis, as determined by the institution, with such participation focusing on academic components and occurring through one or more of the following activities:
 - (i) Regular enrollment in credit-bearing courses with nondisabled students offered by the institution;
 - (ii) Auditing or participating in courses with nondisabled students offered by the institution for which the student does not receive regular academic credit;

- (iii) Enrollment in noncredit-bearing, nondegree courses with nondisabled students;
 - (iv) Participation in internships or work-based training in settings with nondisabled individuals. (HEOA, Title VII, Part D, Section 760)
- *Curriculum adaptations* – modifications that change the way content is represented or presented to students to promote student engagement, either through pedagogical means (e.g., advance organizers) or through the use of technology (e.g., digital talking books). (Soukup, Wehmeyer, Bashinski, & Bovaird, 2007)
- *Curriculum augmentations* – the addition of content to the general education curriculum to enable students to learn skills and strategies to perform more effectively in the general education curriculum (e.g., teaching students learning to learn strategies, cognitive strategies, and student-directed learning strategies). (Soukup et al., 2007)
- *Dual enrollment* – students with ID are simultaneously enrolled in high school and at a PSE institution. (Hart, Mele-McCarthy, Pasternack, Zimbich, & Parker, 2004)
- *Inclusive individual supports model* – model of PSE in which students plan post-school goals with a team of people and then identify and locate the necessary services and funds for accomplishing the goal. Depending on the student’s preferences and interests, the student may attend college classes, a training (certificate) program, work in the community, and/or participate in recreational activities in the community. (Hart, Zaft, & Zimbrich, 2001; Neubert & Moon, 2006)
- *Mixed/Hybrid Model* – programs which are typically located on community college or 4-year college or university campus. This model incorporates some separate classroom instruction, and also offers students with ID an opportunity to enroll in college classes,

participate in campus social opportunities, and explore employment opportunities in the community. (Neubert & Moon, 2006; Neubert, Moon, & Grigal, 2002)

- *Self-determination* – volitional actions that enable one to act as the primary causal agent in one’s life and to maintain or improve one’s quality of life. (Wehmeyer, 2005; Wehmeyer et al., 2011)
- *Student with an ID* - a person with more pervasive support needs including individuals with mental retardation, autism, traumatic brain injury, and multiple disabilities. (U.S. Department of Education, 2004; U.S. Equal Employment Opportunity Commission, 2004)
- *Substantially separate model* – programs which provide employment training, job opportunities, and segregated classes based on a “life skills” curriculum for adults with ID. (Neubert & Moon, 2006)
- *Supplementary aids and services* - “aids, services, and other supports provided in regular education classes or other education-related settings to enable children with disabilities to be educated with nondisabled children to the maximum extent appropriate” (IDEA, 2004, Sec. 602(33)).

Vita

Kimberly Sunshine Handsome was born June 7, 1981, in Cottage Grove, Oregon, and is an American Citizen. She was raised in Eugene, Oregon and Midlothian, Virginia where she graduated from Clover Hill High School in 1999. Kimberly attended Shenandoah Conservatory where she studied Music Therapy with a focus in voice. Upon learning more about persons with disabilities, she left Shenandoah Conservatory to pursue Special Education at Virginia Commonwealth University. In 2005, she received her Bachelor of Arts in Religious Studies with a Minor in Music. She then received her Master of Teaching in Special Education in 2006. Her professional career began in 2005 where she began working at Clover Hill High School in Chesterfield County. While completing her Ph.D. program, she has taught students with all disabilities and found that her passion lies with students with intellectual disability and advocacy for positive change. Kimberly has held the position of Coordinator of Special Education since 2010 and has worked with her colleagues to implement various programs to strengthen services for students with disabilities at Clover Hill High School. She assisted a local church in creating and implementing a program in which teens and adults are trained on how to mentor students with disabilities in an inclusive church environment. She also served as adjunct faculty at Virginia Commonwealth University from Fall 2011 – Summer 2015. During her time in her doctoral program, she has collaborated and taken the lead on several national, state, and local

presentations with her fellow educators. Kimberly has also collaborated and taken the lead on several book chapters and peer reviewed journals.