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Making It Work: Individuals with Autism Spectrum Disorder and Adaptations for Successful Employment

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A Systematic Review of the Literature:

Making It Work: Individuals with Autism Spectrum Disorder and Adaptations for Successful Employment

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Faculty Mentor: Teal Benevides, PhD, MS, OTR/L

Presented in Partial Fulfillment of the Master of Science in Occupational Therapy Degree at Thomas Jefferson University

Objectives of Presentation:

1. Discuss barriers to achieving successful postsecondary employment outcomes for individuals with Autism Spectrum Disorder.
2. Identify and describe evidence for adaptations that support individuals in post-secondary employment.
3. Interpret the clinical implications of the presented findings for occupational therapists, clinicians, educators, and researchers.

PICO: For individuals with Autism Spectrum Disorder (ASD), what adaptations effectively support postsecondary employment and/or job specific skills?

Methods:

- Developed a PICO question, identified databases, search terms, and inclusion and exclusion criteria
- Systematically searched databases using Scopus, ERIC (Ovid), & CINAHL and screened articles by title, abstract and full-text
- 23 final articles were critiqued for appraisal using the Law and MacDermid Evaluation of an Intervention Study Form and Guidelines (2014), a single-subject study rating system adapted from the work of Horner et al. (2005), the Letts et al. Qualitative Review Form (2014), and the PEDro Scale (Maher, Sherrington, Herbert, Moseley, & Elkins, 2003).

Inclusion/Exclusion Criteria:

- **Inclusion:** At least 50% of population was diagnosed with ASD, PDD, or Asperger’s syndrome (with or without co-morbidities) and was 14 years of age or older; adaptations fell within the scope of OT practice; title, abstract, and/or subject explicitly addresses post-secondary employment outcome and/or skills; outcomes were directly related to job skills and/or employment; peer reviewed intervention studies in English, both qualitative studies and quantitative, all levels.
- **Exclusion:** Articles that exclusively used term “children” in title/abstract/subject or listed “elementary” or “middle school” in subject; dissertations, manuals, systematic reviews; published prior to 2005; social participation outcomes not specifically linked to a job skill or outcome or transition services other than those directly related to post-secondary employment (e.g. IEP)

Themes	Characteristics
Technology	Video Modeling: Participants viewed video simulations of work tasks as a visual reference. ^{1, 3, 7, 12, 21, 39}
	Audio/Visual Prompting: Cueing and prompts in the form of alarms, audio coaching, text messages, or pictures. ^{6, 11, 31}
	Interactive Technology: Devices in which the participant directly interfaced with technology & influenced the output of the device. ^{15, 16, 35}
Simulation	Simulated environments: Adaptations took place in simulated environments. ^{6, 7, 11, 24, 35}
Multifaceted Programs	Formal Programs: Programs included JobTIPS and Project SEARCH; adaptations had multiple dimensions, the effects of each could not be isolated in outcome measures; implemented in multiple sites; had an established protocol; included adaptations to physical and social environments and virtual and temporal contexts. ^{17, 36, 42, 43}
	Informal Programs: Not implemented in multiple sites; adaptations had multiple dimensions, the effects of each could not be isolated in outcome measures; may/may not have had established protocol. ^{2, 5, 8, 27, 32, 41}
Our systematic review of the literature found that formal multifaceted programs and use of video modeling meet the criteria to be considered evidence-based practices, as established by The National Professional Development Center for Autism Spectrum Disorders (2015). Other themes do not qualify for consideration as evidence-based practices; however, it should be noted that interactive technology and simulated environments are one high quality study away from meeting this criteria.	

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¹These references are numbered according to their placement in the PowerPoint presentation that corresponds with this handout.